

MANUFACTURERS' RECORD

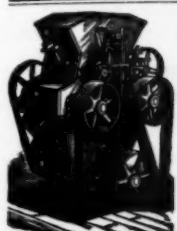
A Weekly Southern Industrial and Hardware Newspaper.

Vol. XII. No. 24.
WEEKLY.

BALTIMORE, JANUARY 21, 1888.

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Report of the AQUEDUCT Commissioners.

[NEW CROTON AQUEDUCT, NEW YORK.]

AN ELABORATE VOLUME, CONTAINING AUTHORITATIVE TABLES BY THE CHIEF ENG., B. S. CHURCH. JUST ISSUED.

PLANT (by actual count from Table 13.)

Number of Ingersoll Drills used..... 248

Number of Drills of all other kinds..... 103

PROGRESS (by actual figures from Table 8.)

Average weekly progress in best 10 headings that used Ingersoll Drills exclusively (omitting all idle weeks)..... 38.73

Average weekly progress in best 10 headings that used other drills exclusively (omitting all idle weeks) 31.08

DIFFERENCE OF 20 PER CENT. IN FAVOR OF INGERSOLL DRILLS.

All headings where Ingersoll Drills were used exclusively have been completed, except the section under Harlem River, now being driven by Ingersoll Drills and Air Compressors. Send for description of Aqueduct, with Engineers' Tables of Progress and Catalogue. Sent free. We have procured a limited number of the Report of the Aqueduct Commissioners, and will send them by express on receipt of \$5, actual cost to us.

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LATHES, PLANERS, DRILLS,
Engines, Shapers, Gear Cutters, &c.



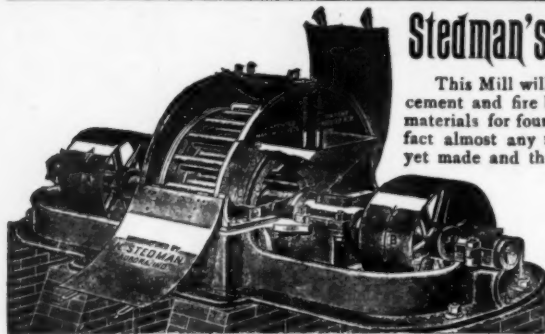
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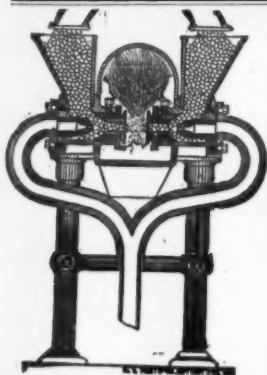


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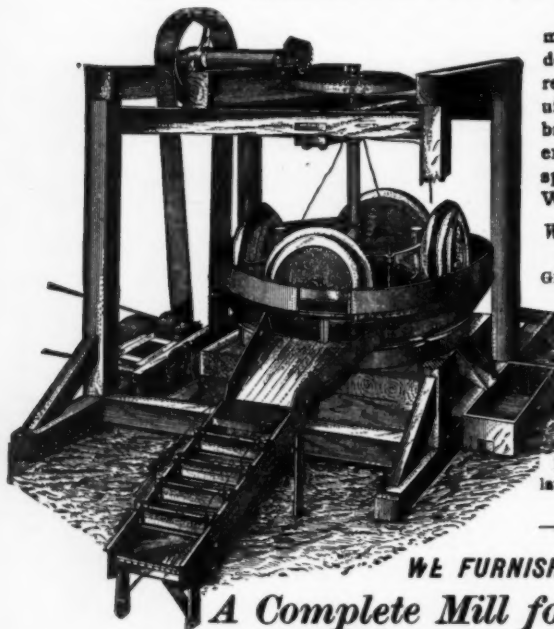
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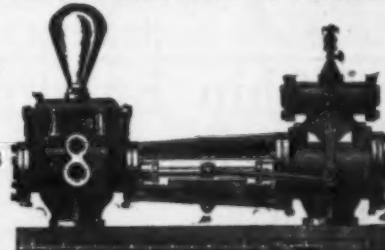
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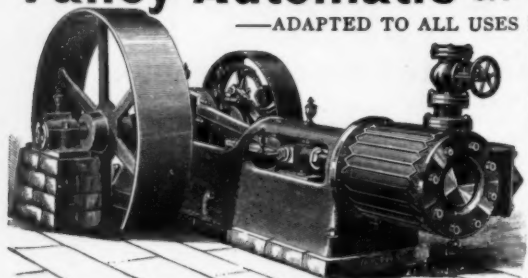
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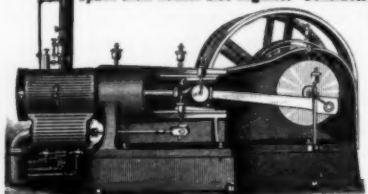
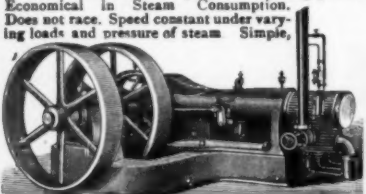
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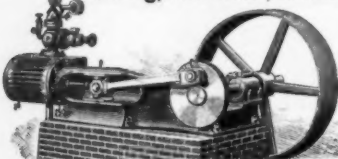
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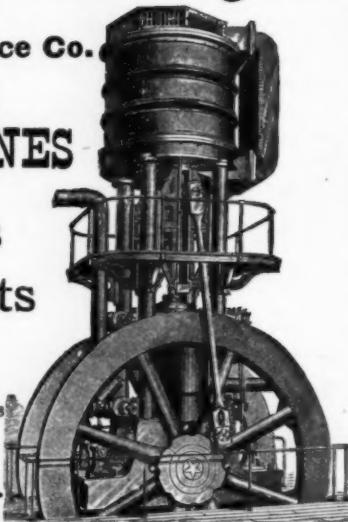
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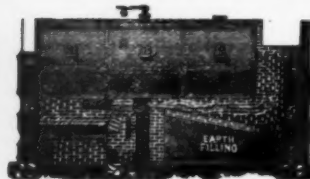


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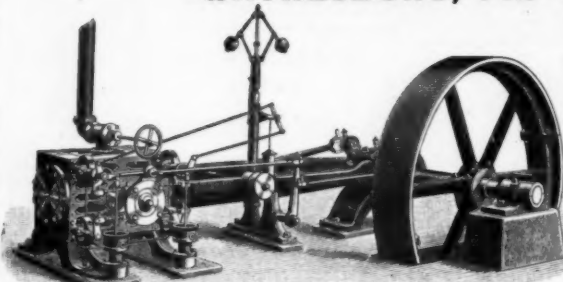
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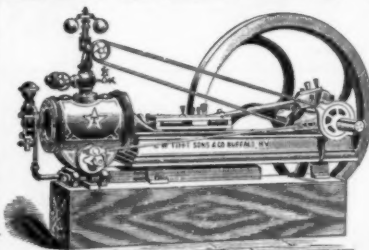
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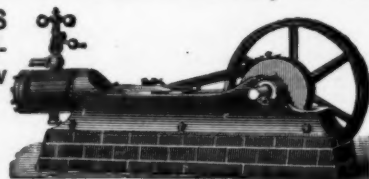
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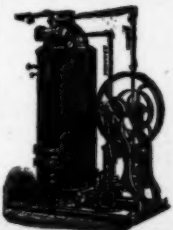
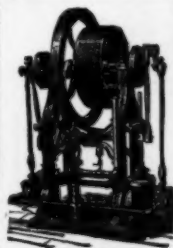
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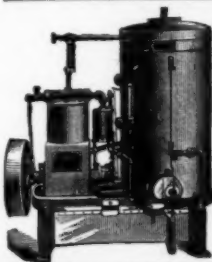
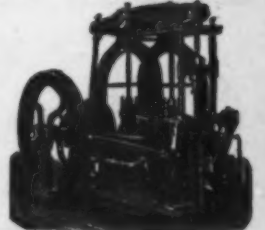
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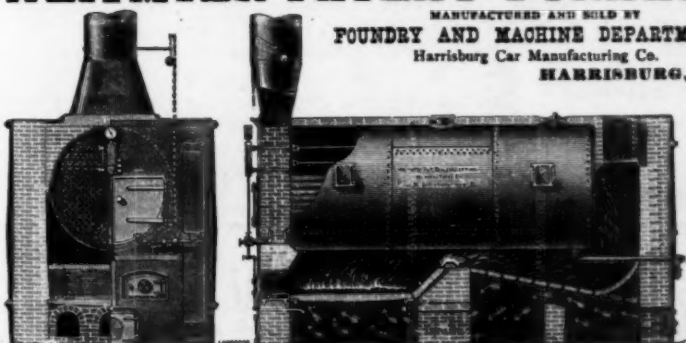
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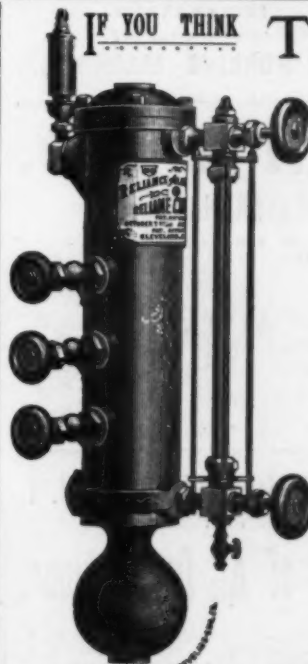


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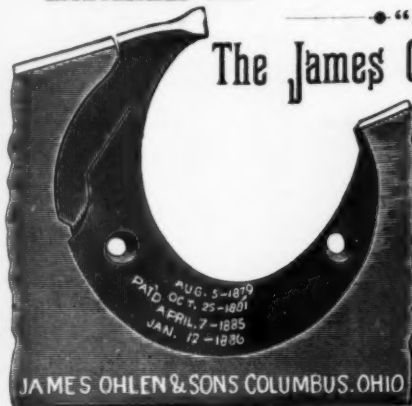
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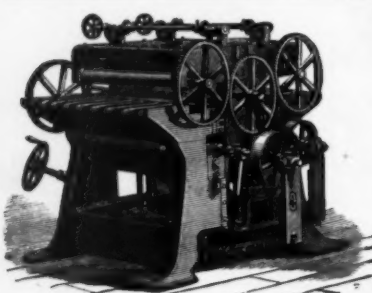
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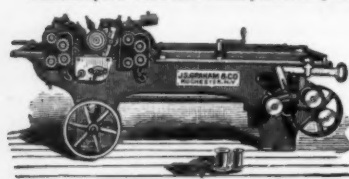
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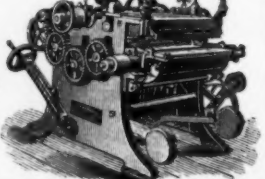
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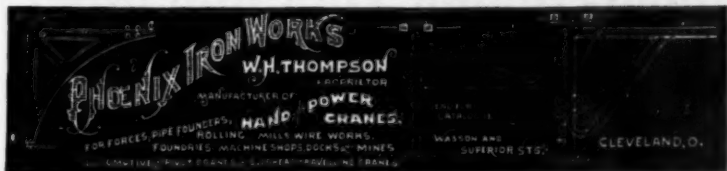
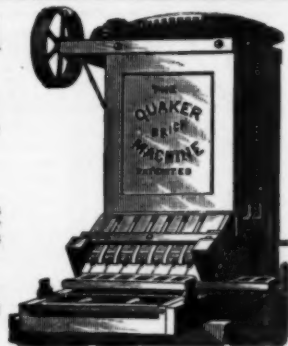


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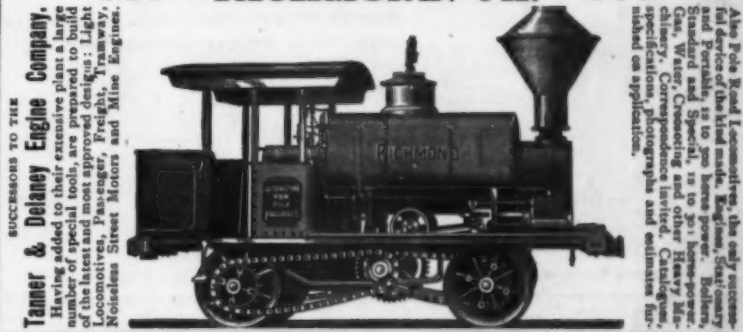
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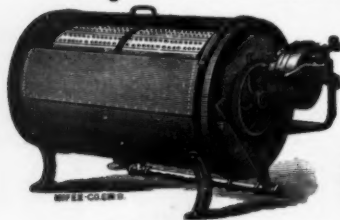
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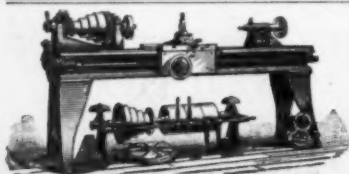


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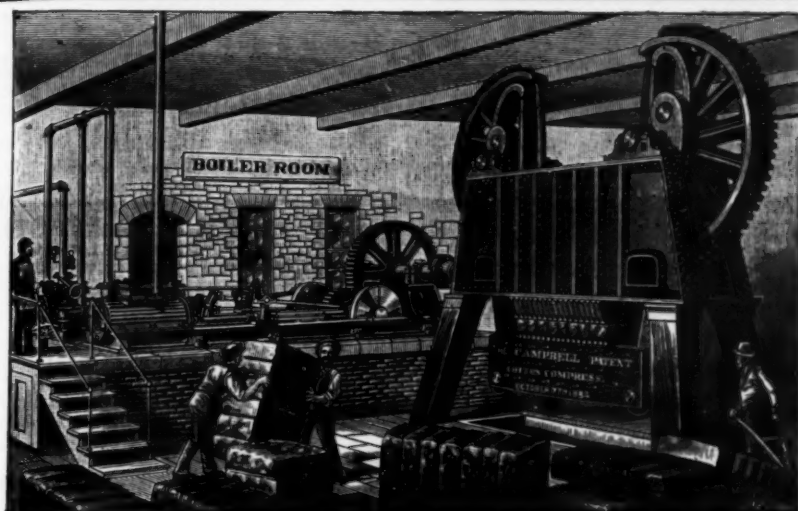
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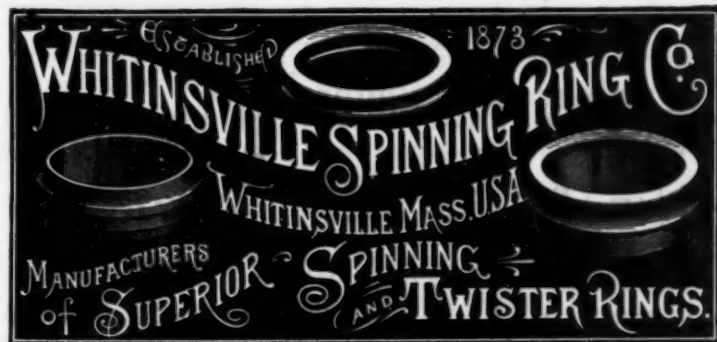
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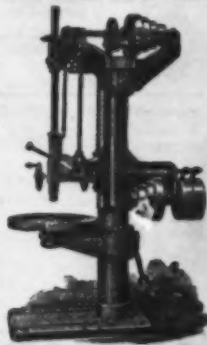
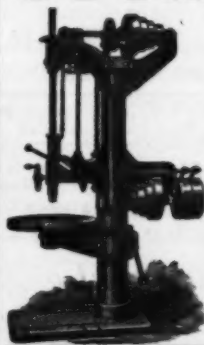
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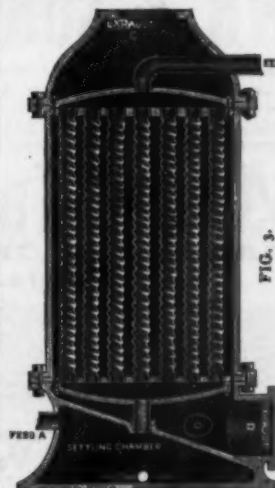
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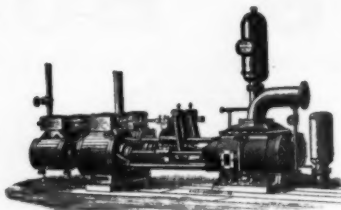
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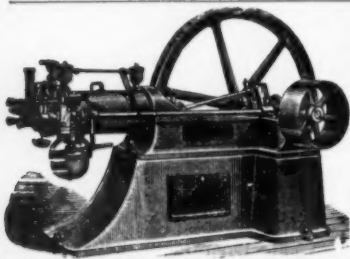
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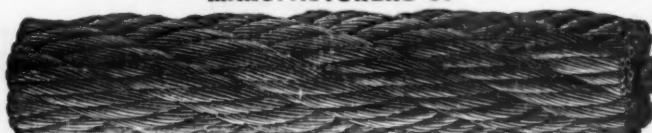
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Manufacturers' Record.

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BALTIMORE, JANUARY 21, 1888.

REFERRING to the attempt to deceive the public by the establishment in Durham, N. C., of a paper called the Southern Tobacconist & Manufacturers' Record, the Fruit Grower, of Virginia, says:

"A similar outrage was perpetrated upon an old-established Virginia journal not long since, but the trick did not work. The old journal was too well and favorably known."

As stated last week, the words "Southern Tobacconist" are in very light type, while the words "Manufacturers' Record" are brought out in very bold type. If our readers will turn to the first page and notice the letter "M" at the beginning of the name of this paper, they will see that it is of peculiar design, and that between the black lines forming the letter there is some fancy scroll work. Now this North Carolina paper has even imitated that letter to the small details. Wherever the name "Manufacturers' Record" appears, at the top of editorial columns, &c., in that paper, it has been set in exactly the same type as in this paper, thus in every detail carrying out the attempted deception as closely as possible. And yet the Raleigh News & Observer takes occasion to make a fling at the MANUFACTURERS' RECORD because it "is endeavoring to instil protection into Southern minds," and claims that the publishers of the Durham paper are gentlemen of too much honor to be guilty of attempting to deceive. Because of its hatred to a paper that advocates protection, the News & Observer lends itself to a defense of such a barefaced attempt at deception as this. If the publishers of the Durham paper are men of such high honor (and of them personally we know nothing whatever), it is strange that they should adopt this method of showing it. The man who infringes upon a patent or a trade mark and seeks to build up on the reputation of another is not usually esteemed a model of honor. And just where the difference comes in in this case we cannot see.

THE Iron Age has made an important change in form, reducing the size of its pages to 9x13 inches and enlarging the number, thus bringing it into something like magazine form. It is needless to say that this is a great improvement, in keeping with the progressive character of that old stand-by of the iron trade.

A Free Trade Fallacy.

The "oil trust" has been, on several occasions, objected to in the strongest terms at the command of the MANUFACTURERS' RECORD. And why? Because, under a combination called a trust, monopolists tried to obtain control of the entire cotton-seed oil product of the South, not at its intrinsic value, but at a far lower arbitrary valuation made by that miscalled trust. Had the monopoly been able to carry out its plans, every cotton planter would have been the sufferer. Fortunately the discussion of the subject by the MANUFACTURERS' RECORD warned the public, and out of that warning began the movement which culminated in the formation of a live competitor, with abundant capital, that destroyed the plans of the monopoly, and gave assurance to every producer that a fair price would be maintained for his cotton seed.

It may not be generally known that one of our correspondents, Mr. D. A. Tompkins, of Charlotte, N. C., while writing a letter, at the request of the editor, for the MANUFACTURERS' RECORD, against the "oil trust," conceived the idea of establishing a rival to it, broke off the letter in half, and used what was intended to be a part of it as a circular to capitalists, setting forth the opportunity for building up such a company. In connection with Mr. Oliver and others, Mr. Tompkins soon had the enterprise in shape, and with his \$5,000,000 company has already built eight immense oil mills.

Whoever applied the term "trusts" to modern combinations, such as the oil monopoly was designed to be, was a shrewd student of human nature. He knew that the term would inspire popular confidence in whatever corporation bore it, because the average citizen would accept the idea it conveyed, and have confidence accordingly. The number of these so called trusts has multiplied rapidly within a few years. While some of these corporations are all that their names imply, the majority are monopolies of the most dangerous character. President Cleveland has noticed this, and in his recent message to Congress he called attention to them in plain and forcible words. It was the one redeeming feature of an otherwise objectionable and disappointing message. The trusts he referred to he defined as those "which have for their object the regulation of the supply and price of commodities made and sold by members of the combination." That comprehensive, clearly put definition covers the subject perfectly. No matter if the President did adroitly use it to assist his attack upon protection, by intimating that producers protected by the tariff laws combined to organize trusts whenever competition between them had "the effect of keeping the price of their products below the highest

limit allowed by such duty." The point he sought to make was that when prices were thus reduced, competitors would join in an effort to restrict production or to pursue any other policy that would be the most efficacious, and thus restore prices to the tariff standard. Virtually it would amount, he thought, to a pooling arrangement similar to those the trunk railroads employ to increase their profits. Following in the line of the President's argument, the New York Journal of Commerce said: "Against these truly dangerous monopolies there is one obvious means of defence. That is either to take off or to lower the duties which can no longer be demanded, in truth, for the protection of American industries. When any domestic manufacture has been developed to a point where its product can be sold in this country as cheap as the imported article, if the duty on that were abolished or reduced to a nominal amount for 'revenue only,' then the famous theory of protection, as expanded by its highest authorities, living or dead, is worked out in practice to the full, and a protective tariff is no longer needed. But that is the occasion, above all others, that would be seized upon by trusts to carry out their nefarious designs. The various competing establishments which had naturally brought down the prices would all be made partners in a league to put them up artificially to the 'tariff point.' It is then, the President says, that a case would seem to be presented for an easy reduction of taxation."

The nub of the President's argument thus clearly stated by the Journal of Commerce opens the way for exposing the very common free trade fallacy that, when domestic competition under protection has reduced prices below the tariff level, then it would be safe to remove tariff duties, because American manufacturers in those lines would be able to hold their own against all foreign competitors. The error of this supposition lies in the fact that if duties were removed foreign manufacturers would instantly endeavor to break down their competitors in this country by putting in their goods at prices far below the cost of production. It would not take more than one season to accomplish their desired end, but, having caused factories to close down and workmen to scatter, they would then advance prices to a point that would more than repay their temporary losses, while the trade of the next few years would give them greater profits than they are used to receive. Free trade Cobdenites in the United States scoff at a prediction of this nature, and call it a bugbear, but history is filled with instances of the carrying out of a policy of this kind, not once, but repeatedly, since this country grew from its colonial condition to be a nation.

The true way to keep down the power of monopolies, and consequently to maintain reasonable prices, is to adhere to protection, for under it the same thing that happened to the oil trust will be repeated whenever an American manufacturing "trust" is organized to monopolize the home market. No one in this country will long engage in any business at a loss. American industries are started to make money. We never engage in industrial enterprises for sentimental reasons. It is the fact now, as it has been from the beginning, that whenever it becomes evident that men are making money in any business there is plenty of capital ready to embark in the same line and compete for a share of the profits. This certain competition is an absolute security against manufacturing monopolies that are not protected by patents. Americans can protect themselves against the greed of domestic monopolists, but should the barriers they have erected against the concentrated capital and cheap labor of Europe be removed there would be, first, a destruction of their industries, and then an increase in the prices of foreign goods to a standard much higher than had prevailed under protection.

While, therefore, the President was right in calling attention to the dangers of such trusts as he defined, he was wrong in ascribing them to protection, and in recommending a tariff for revenue only as an obstacle to their creation and maintenance.

Imports of Ore and Metals.

The imports of metals continue very heavy, the value for November having been \$4,037,189 against \$3,254,149 in November, 1886. During the first eleven months of last year we imported \$55,078,886 worth of metals and iron ore, an average of over \$5,000,000 a month, and an increase of \$15,400,000 over the corresponding time in 1886. Our imports for the two periods compare as follows:

	Eleven months ended	
	Nov. 30, '87.	Nov. 30, '86.
Iron ore, tons.....	1,140,837	954,846
Pig iron, tons.....	443,169	319,448
Scrap iron, tons.....	307,818	66,670
Scrap steel, tons.....	96,068	6,300
Bar iron, lbs.....	76,643,361	60,144,764
Bar railway—		
Of iron, tons.....	841	8
Of steel, tons.....	191,000	89,648
Cotton ties, or hoops, lbs.	47,876,066	20,886,430
Hoops, hand and scroll iron, lbs.....	70,740	234,875
Hoops, hand, &c., of steel, lbs.....	49,064,974	7,462,819
Ingot, blooms and bars of steel, lbs.....	663,470,309	279,383,454
Sheet, plate and taggins' iron, lbs.....	14,773,970	12,478,331
Tin plates, lbs.....	193,968,331	506,283,501
Wire rods, lbs.....	322,113,561	522,213,577
Wire and wire rope, lbs.....	5,705,812	5,043,777
Avails, axles and forgings, lbs.....	2,880,975	1,848,973
Chains, lbs.....	1,019,533	1,221,531
Cutlery.....	\$1,850,697	\$1,648,108
Files, file blanks, rasps and		
diamonds.....	66,221	48,630
Fire-arms.....	996,124	801,929
Machinery.....	1,710,530	1,504,480
Needles.....	303,597	311,347
All other.....	1,803,138	1,387,830
Total, including iron ore	\$55,078,886	\$30,660,089

THE Maginnis Cotton Mills, New Orleans, La., have decided to increase their capital stock from \$500,000 to \$1,000,000 and enlarge their mill from its present capacity of 17,000 spindles to 40,000 spindle.

Fuel Gas vs. Natural Gas.

A year or two ago, when natural gas and its wonderful cheapness were attracting such wide attention, causing almost a revolution in some industrial interests, Messrs Disston & Sons, the great saw manufacturers of Philadelphia, contemplated the removal of their immense plant to the natural gas regions. The undertaking, however, involved such immense interests that they investigated very carefully and thoroughly, and finally determined to abandon the idea after being convinced that by a new process it was possible to make fuel gas at their own works at such a low cost as to offset the advantage of natural gas. Last week the MANUFACTURERS' RECORD gave the facts regarding the remarkable success at the Disston works of this fuel gas made by the Loomis process. It is now demonstrated that this gas can be made so cheaply as to greatly reduce the cost of fuel, and its introduction into the South will counterbalance the only advantage which Pittsburgh and that section has possessed over the South, by having natural gas. Already Decatur has taken the lead and contracted for a \$200,000 plant to furnish this fuel gas to manufacturers at a cost not to exceed the equal of coal at \$1 to \$1.50 per ton, as well as to make gas for illuminating purposes. A glass manufacturer in Baltimore, who contemplates using this gas as fuel, has been offered a guarantee, with abundant security, of a saving of 33½ per cent. compared with the cost of his coal, provided he would give the guarantor all that was saved over that amount. This gas can be made by individual establishments for their own use, as well as by special plants designed to furnish it to other manufacturers for fuel, and also to make at the same time illuminating gas.

ONE day last week a few business men were gathered together in a bank in Charlotte, N. C., and in a general conversation some comment was made on the proposed building of a cotton mill by a company recently organized there. It was said that the more mills the better for the city, as well as for the stockholders, and this remark meeting with approval, it was casually suggested that if those present believed that, let them show their faith by works. Then one gentleman proposed to organize a new company to build a second mill, and in ten minutes \$85,000 was subscribed. The next day \$30,000 was added to it, and it is probable that before the company can be organized the amount will run up to \$200,000. So Charlotte will soon have two mills under construction. This shows how Southern people can push matters when they are interested. Lynchburg is also doing something in the same line. Her people concluded to build a \$150,000 mill, but when they got well down to work on subscriptions they ran the amount up to \$200,000.

Cotton Mills.

The South is now turning its attention to cotton-mill building in such a way as to assure a rapid growth of this business, and one of the most satisfactory features of it is that the men who have been the longest engaged in cotton manufacturing are the most active ones in pushing the business. In view of the attention now being attracted by this industry, it is of interest to see how Northern cotton mills are prospering. A report of the dividends declared during 1886 and 1887 by the great mills of Fall River, Mass., shows that they are earning big profits. The dividends for these years were as follows:

Corporations.	Capital.	Dividends.	1886.	1887.
American Lines.....	\$ 400,000	12½	13½	
Barnard.....	350,000	5	8	
Bourne.....	400,000	6	12	
Border City.....	800,000	8½	12	
Barnaby.....	400,000	6	8½	
Chace.....	500,000	6	6	
Crescent.....	500,000	6½	6	
Dayrol.....	400,000	..	1½	
Flint.....	350,000	6	6	
Globe Yarn.....	900,000	6	8	
Granite.....	400,000	12	18	
King Philip.....	1,000,000	6	6	
Laurel Lake.....	400,000	4½	6	
Merchants.....	800,000	8	7	
Mechanics.....	750,000	6½	6	
Metacomet.....	8,000	..	3	
Narragansett.....	400,000	6	6	
Osborn.....	600,000	8	8	
Pocasset.....	8	
Richard Borden.....	800,000	4½	6	
Robeson.....	950,000	4½	6	
Saginaw Mfg. Co.....	600,000	8	11	
Shore.....	350,000	4½	6	
Slack.....	550,000	1½	3½	
Stafford.....	550,000	7	12	
Seacoast.....	500,000	..	5	
Tecumseh.....	300,000	9-4-5	17	
Troy.....	750,000	16	21	
Wampanoag.....	750,000	9½	13	
Weetamoe.....	350,000	4	4	

With only two or three exceptions these mills, it will be seen, paid large dividends last year, and, moreover, doubtless added considerably to their surplus account, as is their rule. Now here are mills paying the heavy expense of shipping their cotton from the South to Massachusetts, and yet declaring in some cases 11, 12, 13, 17, 18 and 21 per cent. dividends, besides increasing their surplus. Of course, many of the mills did not do so well, but these very profitable mills have simply proved what can be done. The South, where the cotton is produced almost at the doors of the mill; where it is estimated there is saving in freight, commissions and insurance of \$5 a bale, as compared with Northern mills; where the climate is all that could be desired, and where power is cheaper, is the place for the cotton mills. We are glad to see that all over the South there is great interest in this subject, and that the outlook for cotton-mill building is unusually promising.

GADSDEN has scored a good success in securing Mr. L. W. Scovill, the noted hotel man, as purchaser of the fine Printup House, now building, at a cost of \$50,000 or \$60,000. Mr. Scovill will also take the Bellevue House on the Highlands, near Gadsden, and run the two in connection. This will make Gadsden one of the most desirable summer resorts in Alabama, as well as a delightful winter place. Good hotels are essential to the prosperity of any town, and Gadsden has done well in thus being able to offer two fine houses to the traveling public.

Internal Revenue Must Go.

Two Southern Senators have recently expressed the views of their constituencies in opposition to the internal revenue laws. Senator Brown, of Georgia, opened the debate in a speech that presented the subject in every light, historic, economic, patriotic and moral. A day or two later he was followed by Senator Vance, of North Carolina. The first speaker is a strong protectionist; the second is one of the most earnest and plausible advocates of free trade, but diametrically opposed as they are on that issue, they are cordially agreed as to the necessity and duty of repealing the internal revenue taxes. In this they represent not only their personal convictions and the wishes of their respective constituencies, but also the opinions and desires of the vast majority of the Southern people. Behind them is a moral power that has not yet brought into action the great forces at its command, but is preparing to do so. This is the Women's Christian Temperance Union, an organization with an able leadership that has large bodies of earnest supporters in every State and Territory. This union has arrayed its members in opposition to the whiskey tax, and soon they will urge the abolition of the internal revenue system, and bring every influence they can command to bear upon Congress. When several hundred thousand intelligent, conscientious Christian women enter upon a work of this kind, supported by the moral convictions of the majority of American freemen, it will be up-hill business for the average Congressmen to resist their assault in force. In spite, therefore, of the money and political power of the whiskey ring, we may hope to see this obnoxious system abolished before the close of the present session. Certainly it will be if the Women's Union will give Senator Brown's unanswerable speech a wide spread circulation, for the calm, dispassionate presentation he made of the evils attendant upon the enforcement of the law is certain to create such a disgust for it among all right-thinking citizens, that public opinion will swell into a mighty wave that will overwhelm every member of Congress who attempts to oppose it. The outlook is bright, although the repeal is not yet assured. But earnest work will secure it, and every true friend of the South should at once engage in it.

MESSRS. F. C. & E. H. BUFFUM, of Stanton, Fla., have issued a neat pamphlet entitled "The New South as a Field for Investment." This little book presents many facts worthy of the widest possible circulation. It sums up in excellent manner from the MANUFACTURERS' RECORD and other sources of information the wonderful progress made in five years by the South, and shows the opportunities offered for profitable investments.

The Tariff on Wool.

THE wool growers and woolen manufacturers in convention, at Washington last week, conferred together upon their mutual interests as affected by the tariff. Some free trade journals had asserted frequently that the sheep husbandmen and the manufacturers would never combine, and had predicted that this convention would end in a serious rupture. Doubtless "the wish was father to the thought," for in the proceedings there was nothing to justify the free trade forecast. On the contrary harmony marked the entire proceedings. The manufacturers agreed with the farmers that there ought to be a protective duty on wool heavy enough to save sheep husbandry of this country. A new schedule was prepared that substantially re-enacts the law repealed in 1883, when a reduction was made at the suggestion of congressional revenue reformers who insisted that it could do no harm. The reformers aforesaid will not acknowledge they were mistaken, but the farmers very soon learned to their cost that a serious blunder had been made, and they now demand a restoration of the ad valorem rate. The woolen manufacturers join in this demand, and also for such a change in the schedules and classifications as shall put a stop to the frauds now practiced under the carpet wool clause, and also give them a protection of at least 50 per cent. on the cloths they make, as an offset to the difference between the wages paid to employees here and in Germany and other countries of Europe. The convention passed resolutions endorsing the protection policy, which is necessary to the prosperity of farmers and manufacturers alike. Three points were set forth by the convention respecting the economic effects of the tariff upon the wool industry, viz:

1st. The repeal of the ad valorem tax in 1883 was followed by a great reduction of sheep, the aggregate loss between then and 1887 amounting to nearly 6,000,000.

2d. In 1859 this country used 65,749,635 pounds of wool. In 1861 the tariff was enacted, and under the protection it afforded the number of pounds of wool consumed in 1885 was 424,404,109 pounds.

3d. In 1860 the people of this country bought only 62.8 per cent. of woolen goods of American manufacture, while in 1880, in consequence of protection, the consumption of home made woolen goods had increased to 81.9 per cent., or more than 19 per cent.

It was also resolved that, "as under the protective policy the United States has become the foremost manufacturing nation of the world, while its agriculture has been extended and diversified by the incentive of the most profitable markets known to men, prudence forbids the overthrow of a system of revenue under which such results have been obtained,

while the wages of labor and share of production paid to the American artisan are far greater than in any other country."

Such is the reply to that part of the President's message which related to wool from the sheep husbandmen and woolen manufacturers of the United States.

More Rolling Mills Needed.

Superintendent Dywer, of the Birmingham Rolling Mills, in telling a Chronicle reporter of the new machinery for rolling steel plates from the ingots, to be made by the Henderson Steel Works, now nearly ready to start up at Birmingham, said:

Well, as you doubtless know, the capacity of the mills is 600 tons per week, and our orders call for iron in every shape and size. Just now we are filling a large order for small iron rails, and before we can finish one contract another is made for the same class of work. The local demand is also very great for boiler iron, and with the foreign demand for our products we have been behind on our orders in that class of iron for more than five years. I have never seen the time when these mills were not several months behind in its work. We sell iron in nearly every State in the Union. Why, it looks strange, but we are now filling an immense order for a firm in Los Angeles, California, and it is money in their pockets to buy from us, even with the heavy freights that the long distance necessitates.

For five years these great rolling mills have not been able to catch up with their orders, and are always two or three months behind in their work. Is any stronger argument needed to show why more rolling mills ought to be built?

Anniston's New Furnaces.

In giving a detailed description of the two big furnaces under construction at Anniston, the Hot Blast says:

But few people realize the immensity of the work now going on at the new furnaces or the wonderful effect that the completion of these furnaces will have upon all branches of trade in Anniston.

The work on the new furnaces was commenced in May last, and has been going steadily forward ever since. The stock house, 500 feet long and 75 feet wide, is nearly completed, and the two cast houses are now ready for the iron roofs, which will be placed on at once.

The foundations are all in, and the Whitwell hot blast stoves are nearly completed. Noble Bros. & Company have the contract for the construction of five blowing engines which will be large, massive and complete. They are made on the latest and most improved pattern, and will cost about \$100,000. The eighteen steel cylinder boilers, manufactured by J. & D. Noble, are completed, and are being placed in position. If the work proceeds at its present rate the furnaces will blow in during the early part of the summer.

The furnaces will be sixteen feet bosh and seventy-five feet high, and have a weekly capacity of 1,100 tons of pig iron each. They will use 5,500 tons of ore per week, or nearly 800 tons daily; 400 tons of coke per day, or 2,800 tons weekly; 200 tons of limestone daily, or 1,400 tons per week, being a total consumption per day of 1,400 tons of ore, coke and limestone, while other material, sand, etc., will make 160 tons additional, when the daily consumption will make a grand total of 1,560 tons. This will be equal to 100 car-loads per day brought into Anniston, and will require the services of six engines and train crews.

Revenue Census Statistics.

BY E. B. A.

[For MANUFACTURERS' RECORD.]

The report of Mr. Joseph S. Miller, the commissioner of internal revenue, who has made a very excellent administration of his office, gives some interesting facts.

The whole revenue receipts for 1887 were \$119,837,301, or an increase of nearly a million dollars over the year 1886. Of this amount \$87,750,000 were from spirits and fermented liquors, and \$30,000,000 from tobacco. The cost of collection was a little over \$4,000,000, or nearly 3 1/2 per cent. of the whole.

The spirits produced were nearly 78,000,000 gallons. The bushels of grain distilled were 18,000,000, or over 4 gallons to a bushel.

In addition to what was produced there were 58,000,000 gallons of spirits in the warehouses at the beginning of the fiscal year. We thus have an enormous amount of 136,000,000 gallons of liquor on hand and made during the year ending July 1, 1887. This is two gallons and over to every man, woman and child in the country.

In looking at the distillation and revenue, four States alone produce \$66,000,000 of the whiskey receipts. These four States are Illinois, New York, Ohio and Kentucky, and three of these States, producing \$53,000,000 of the amount, have only 181 distilleries out of 4,905; these three States are New York, Illinois and Ohio. With one-twenty-fifth of the distilleries they make over two-thirds of the whiskey. The fact shows what masses of capital are concentrated in the business in these States.

The smallest amount of this revenue comes from Vermont, only about \$30,000. The largest amount comes from Illinois, nearly \$25,000,000. The largest number of distilleries is in North Carolina, 1,462, and producing only \$2,000,000, and Virginia comes next with 1,075 distilleries.

The principal material used was corn; of the 18,000,000 bushels used nearly 13,000,000 being corn, and rye 3,000,000. In this revenue business 3,587 men were employed to conduct the business.

In the tobacco business the receipts were a little over \$30,000,000, of which \$16,000,000 came from chewing and smoking tobacco, and \$11,250,000 from cigars and cheroots. The number of cigars made was 3,788,000,000, and the cigarettes 1,581,000,000, or 90 to every man, woman and child. Curiously enough in the manufacture of tobacco and cigars, New York leads, using 27,000,000 pounds and making 1,000,000,000 cigars, while Pennsylvania comes next, using 18,000,000 pounds of tobacco and making 88,000,000 cigars. In the manufacture of tobacco Virginia leads, using 54,000,000 pounds, while Missouri stands next, manufacturing 42,000,000 pounds. New York made only 20,000,000 pounds and Pennsylvania only 4,000,000 pounds. Little New Jersey manufactured 39,000,000 pounds, and North Carolina 26,000,000.

In the administration of whiskey there are some profoundly significant and startling facts. The whole tendency of the plan seems to favor the large capitalists at the sacrifice of the small distillers. For instance, no man is allowed to distill whiskey whose still makes less than 20 gallons in three days. This regulation cuts off the great mass of small farmers in the mountains who are too far from market to transport their corn, and yet who cannot distill on a large enough scale to meet the requirements of the law.

The profits in the whiskey business are enormous. In the Western States a bushel of corn can be bought for 40 cents; a bushel of corn will make over 4 gallons of whiskey. Thus the material for a gallon of whiskey costs but about 10 cents, while the expense of making it in a large distillery is another ten cents, the whiskey

being thus produced for 20 cents a gallon. It is put in a bonded warehouse and allowed to remain for three years without payment of any tax, guarded and stored at the government expense without any cost to the distiller. At the end of the three years the mellowed whiskey, which cost 20 cents, is worth from two to three dollars a gallon. The distiller pays 90 cents tax, which, added to the 20 cents for material and making, makes the whiskey cost him \$1.10 a gallon. If he gets \$3 per gallon his profit is \$1.90. But allow him a dollar a gallon of profit and the aggregate profit on the 78,000,000 gallons made every year would be \$78,000,000 for the 966 distilling establishments, or an average of \$75,000 to the establishment—a neat profit.

But the distiller can send his whiskey abroad without paying any tax at all and sell it in foreign markets. If he don't sell it and does not break the package he can bring it back, paying a tax of 90 cents a gallon on its reimportation; when the foreign whiskey has to pay a duty of \$3 a gallon and when it gets here has to pay all the charges of warehouse. Thus the large distiller is protected against the small distiller at home and foreign whiskey abroad.

It is a curious fact that the distillers favor the retention of the 90 cents tax, which works in favor of securing a monopoly in the whiskey business. There are over 4,000 officials and employees in the revenue service. The cost of the system is over \$1,000,000 to the government. In the State of Georgia alone there were over 4,000 men arrested for illicit distillation, and over 2,500 of them convicted and punished. The State of Georgia alone has paid over \$22,000,000 to the government as internal revenue since the war, or \$1,000,000 a year. These are facts brought out by Senator Brown in discussing the revenue system and urging its repeal in a strong speech in the United States Senate. He charges and proves that it is the greatest monopoly in the country. Appended are some tables giving interesting general statistics of revenue, especially the receipts, distilleries and bushels of grain in each State, with the rank of the States, and also comparative statements of the two last years:

THE RANK OF STATES IN FURNISHING WHISKEY REVENUE.

State.	Receipts.	Grain in distilleries operated.	All distilleries operated.	Grain used, bushels.
1. Illinois.....	\$44,885,704	21	47	5,305,312
2. New York.....	15,101,203	2	66	490,361
3. Ohio.....	13,868,226	28	68	479,300
4. Kentucky.....	12,417,529	299	613	4,635,499
5. Pennsylvania.....	8,190,888	89	127	921,333
6. Missouri.....	7,858,789	23	62	753,611
7. New Jersey.....	4,596,161	1	82	137,604
8. Indiana.....	4,239,038	9	61	806,793
9. Wisconsin.....	3,179,264	3	5	225,693
11. Maryland.....	2,875,597	23	32	454,499
12. Virginia.....	2,693,394	30	1,075	26,486
13. Mass.....	2,471,131	1	2	21,006
14. Nebraska.....	2,093,404	2	6	221,407
14. California.....	2,081,221	1	233	94,775
16. N. Carolina.....	1,950,701	307	1,462	224,324
15. Iowa.....	1,751,124	2	8	423,078
17. Michigan.....	1,404,607	1	1	1,218
18. Tennessee.....	1,012,316	59	261	229,276
19. Minnesota.....	554,688	1	1	1,000
20. Louisiana.....	543,748	1	1	1,000
21. W. Virginia.....	538,956	1	114	57,038
22. Connecticut.....	481,405	1	77	22,498
23. New Hamp.....	377,509	1	5	1,000
24. Georgia.....	336,705	61	246	90,694
25. Florida.....	324,903	1	1	1,000
26. Delaware.....	263,217	1	56	1,000
27. Colorado.....	260,154	1	1	1,000
28. Rhode Is'd.....	226,431	1	1	1,000
29. Kansas.....	211,120	1	3	2,831
30. Texas.....	209,343	3	7	2,517
31. Oregon.....	159,318	1	12	1,967
32. Montana.....	101,158	1	1	1,000
33. S. Carolina.....	100,146	14	29	17,117
34. Arkansas.....	97,430	19	37	16,394
35. Alabama.....	78,549	3	39	1,218
36. Nevada.....	70,419	1	1	1,000
37. New Mexico.....	63,565	1	5	1,000
38. Maine.....	50,286	1	1	1,000
39. Mississippi.....	49,008	1	1	1,000
40. Vermont.....	30,119	1	4	1,000

REVENUE RECEIPTS.	1886.	1887.	Decrease.
1886.....	\$116,000,809 44	1887.....	\$119,837,301 06
Increase 1887 over 1886.....			\$3,836,491 62
1886.....	1887.....	Decrease.....	
Spirits.....	\$69,092,666 00	\$65,899,321 71	\$3,193,344 29
Fermented.....	19,676,731 29	21,022,187 49	2,345,456 20
Liquors.....	27,007,306 49	30,108,067 13	3,090,760 64
Tobacco.....	78,549 04	793,048 04	714,499 00
Oleum rine.....	226,509 62	240,448 32	13,938 70
Miscellaneous.....			Decrease.....
Spirits.....	\$22,008,997 29	\$7,751,509 20	\$14,257,488 09
Liquors.....			Decrease.....
Cost of collection.....	\$4,065,148 87		34 per cent.

The Boundless Wealth of North Georgia.

COLUMBUS, GA., Jan. 13, 1898.

Editor Manufacturers' Record:

The MANUFACTURERS' RECORD has done valiant service in defense of the South, and is, no doubt, calculating to do much more in the future. The wonderful showing in the way of manufacturing progress challenges the admiration of the world.

One section, however, of our Southern country, while not by any means overlooked, has not had the conspicuous mention that it deserves. The Piedmont Exposition of 1897 at Atlanta opened the eyes of the world to what North Georgia can do if she tries. The display made by the Richmond & Danville Railroad, the Marietta & North Georgia Railroad, the counties of Floyd, Cobb and others, were only an incident in the capabilities of that section. Take all that section having for its northern line the south boundary lines of Tennessee, South and North Carolina; its east and southeast line the Fugate river and the Richmond & Danville Railroad; its western line the State road from Atlanta to Chattanooga, you have more than 175 miles square of the finest land in the world. With the exception of coal it has every ore that can be found in the Southern States. But one railroad now touches this immense domain of mineral and timber lands. The Marietta & North Georgia Railroad cuts it nearly in half, and another road now building from Augusta to Chattanooga will again divide it east and west, crossing the Richmond & Danville at Gainesville and the Marietta & North Georgia Railroad somewhere near Ellijay. This being done, we see no reason why that portion of our State does not surpass even the fabulous story of North Alabama. The purest of water, the best of healthy mountain air, all the hardwood timbers known to the South, mountains full of gold, silver, copper, lead, ochre, mica, iron, manganese, and enough marble to build Karnak a million times. Far-seeing capitalists are taking advantage of these prospects and buying up vast areas of these lands. See what the Georgia Marble Co. did in buying for a few thousand dollars a property they value at \$2,000,000. Go the length of the Marietta & North Georgia Railroad and see what vast capabilities there are for other corporations to do the same. Within the past three weeks a wealthy syndicate from the far Northwest quietly slipped in and bought nearly half a county near Ellijay, securing thereby some of the richest gold, iron and silver veins in the United States. The price they paid was a mere bagatelle compared to the value of the land—less than \$1 per acre. There are single lots on this purchase worth more than they paid for the entire 50,000 acres, and endless forests of valuable timber, beautiful valleys for farming, and water in great abundance. While this was being done another party of Englishmen scooped up a valuable gold bed in the vicinity of Dahlonega for a few thousand dollars. Report says that gold has been found as high as \$250 per ton; copper mines as rich as any in the world; ochre equal in value the finest French ochre; lead, mica and talc in quantities incredible, to say nothing of the iron and manganese, which are inexhaustible. But it is not so much to its ores as to its hardwoods to which we call your attention. Your readers are already apprised of the change of ownership in Port Royal, S. C. Here is the key to the whole question, for in that plan is the idea of the railroad from Augusta to Chattanooga. With that road running, we have a straight line from Memphis to the Atlantic, taking the cotton from the Mississippi delta, the iron from Decatur, Chattanooga and Northwest

Georgia, through to deep water in a straight line. Better than all this is the outlet it will give for all the valuable hard woods in the upper counties of Georgia. Her hills and valleys are heavily covered with every known valuable timber. But her wealth lies in her oak, hickory, poplar, gum, cherry, walnut, maple, chestnut, beech, elms, spruce, &c. With a straight pull to Port Royal, Savannah and Charleston, they can be put down in Europe and Great Britain at less cost than from any point in America. The nearness to deep water is what is giving to South Georgia to day her timber trade. There are no hard woods to day as near to Europe as those in North Georgia, and yet these precious acres are every day being grabbed up by syndicates at less than \$2 per acre. On many of these acres there are 50 trees of hard wood worth two to five dollars apiece in building a ship or fine furniture. We have seen oak, hickory and poplar trees large enough to square two feet a length of 40 feet, and by the simplest calculation you can see such a tree is worth from five to ten dollars, according to species. The population inhabiting these northern counties are, as a rule, poor people. They have held their lands so long and waited so anxiously for the coming of developments, they are anxious to sell. Three dollars per acre will buy the best of these forests. A few thousands will buy the richest of these mines. The woods are full of investors quietly looking about and taking up the choicest tracts, and before another decade the wealth of this garden spot will have passed into their hands, and we will all wonder why we did not see it. When you can buy an acre of land for the price of four cigars, it is no fraud to ask a stranger to come and buy. Knowing the willingness of the MANUFACTURERS' RECORD to "speak out in meeting," we feel that we can confidently count on you to speak a good word for this neglected section of Georgia. While the Piedmont Exposition did a lasting service to the State and county, not enough emphasis was put upon the particular section described in our opening lines. We know of one enterprising company who are proposing to sell every other alternate lot of their immense tract of land in Fannin and Gilmer counties at \$2 per acre, and give long time to pay it. We know of immense blocks of marble ten times as large as St. Peter's, at Rome. We know of hillsides so thickly covered with iron boulders you can barely scramble over them. Yet you rarely ever hear of North Georgia. She will be heard, however. Let the MANUFACTURERS' RECORD heed her cries.

J. A. WALKER.

ONE of the most beautiful books ever printed in the South, and we think probably the finest of the kind ever issued in the country, is the magnificent work entitled "The City of Louisville and a Glimpse of Kentucky." This volume is issued by the Board of Trade Committee on Industrial and Commercial Improvement, of which Mr. Young E. Allison is the secretary. It is for free distribution and must do Louisville an immense amount of good. The success of Mr. Allison in pushing Louisville to the front has been somewhat phenomenal and demonstrates what a man of tireless energy and fertility of resource can accomplish. Would that every city in the South had such a man, and that their business men, like Louisville's, were ready to back him up with the money to advertise the town. We believe Louisville raised about \$15,000 or \$20,000 for this purpose last year.

Iron Industry in Olden Times in a Tennessee County.

SHOWNS CROSS ROADS, TENN., }
January 14, 1888. }

Editor Manufacturers' Record:

Johnson county is the most eastern county in the State of Tennessee, and joins Watauga and Ashe counties, North Carolina, and Greyson and Washington counties, Virginia. This county is diversified with hills and mountains, but not so rugged as the hills and mountains of Western North Carolina. The Stone, the Doe, the Lion and the Holston mountains are the principal ranges, and run parallel with each other in a northeast and southwest direction. Beautiful valleys of considerable size intervene between these ranges, the largest being the valley of Roans creek, which is about twenty miles long and in places from one to two miles wide. The soil is very fertile and produces abundantly of all kinds of grain. The valleys of Doe and Laurel are also very fine for agricultural purposes. The streams all run westward, except Laurel, which runs north and empties in the Holston (Hogheega) near Damascus, Va., a proposed iron manufacturing city. All these streams offer fine water power sufficient to drive most any kind of machinery, some of which have been in use for a great many years in the manufacture of hammered bar iron and blooms. The first of these primitive iron forges built in the State of Tennessee was erected in Johnson county (since taken off of Carter county), on the same site where Dr. R. C. Rheas, iron works now stand. Making iron in this way was once a very profitable and extensive industry in this county, fifteen of these manufacturing establishments being in operation at one time in different parts of the county. The products found ready market up to the beginning of the war. It was very thrilling and animating to a man standing upon the pinnacle of the Doe mountain near the center of the county on a still morning and hear the mighty thunders of fifteen forge hammers all operating at the same time. Just prior to the war, when Hon. L. C. Haynes, of Tennessee, was addressing the citizens of Johnson county upon its wonderful iron resources in connection with a proposed railroad, in a flight of fancy he said: "The music of the spindles would be heard in the valleys and the loud blows of the forge hammer would echo to the thunders of the passing steam car." But alas, the hopes that he inspired in the minds of this people have long since vanished like an idle dream, and the most of these forges have vanished with it; and the moss-covered stacks stand as monuments to the enterprise and industry of our fathers, and the snake and the owl and the bat now find a hiding-place where the blast once roared and the crude ores were smelted. These immense deposits of ores are still awaiting the railroad and the skillful hand of the modern steel and iron master. These ores are of the brown hematite species and of fine quality, and disseminated throughout the entire county; not a farm or a tract of land in the county of any size but what show more or less outcrops of these ores. The quantity is immense and is deposited in every hill and mountain and in many places apparently inexhaustible. No excavations of any depth have ever been made, but all the ores used by the primitive iron masters were taken from the surface or very few feet under ground. The vast amount that must be deposited here is beyond all human conception. No county in Tennessee can compare with it as to the quantity and quality of her ores. One tract of iron property of about 8,000 acres, lying on Doe mountain between the valley of Roan creek and Doe creek, to which I would call special attention. This prop-

erty belongs to Mr. N. J. Wagner, of Mountain City, Tenn., and is very desirable to purchasers. In addition to the immense deposits of iron on this tract, heavy veins of manganese have been recently developed, which appears to be of very fine grade. This property is located within from fifteen to twenty miles of Damascus, Va., and from twenty to twenty-five miles of Elizabethton, Tenn., and about the same to Bristol, Tenn., with practicable route for railroad to either point. This property, with other good property here, is for sale at almost nominal price. There are now prospects of railroads at an early date penetrating this vast field of undeveloped mineral wealth; also where impenetrable forests of fine timber abound and where the soil is productive of all the cereals, grasses and fruits of this latitude; where flow crystal streams from mountain gorges, pure and limpid; where mountain scenery is grand and sublime; where cold springs of pure water, like so many health-giving tides, burst forth from the hillsides. The atmosphere is salubrious and healthful. The people are intelligent, refined, hospitable and temperate. There is no country superior to this as a summer resort. It is truly the "Land of the Sky." No country beneath the sun offers greater inducements to the capitalist, the manufacturer and the visitor than this God given country of ours.

ISAAC DOUGHERTY.

A Good Point for Factories.

WEST POINT, VA., Jan. 10, 1888.

Editor Manufacturers' Record:

In the advertising columns of your paper I notice you publish an ordinance from West Point, Va., that the town will exempt all manufacturing enterprises of every kind from taxation. The council mean what they say about this, as there are enterprises here that pay no taxes for corporate purposes. West Point has a population of about 3,000. In 1880 her population was 600. The increase has been steady but rapid. The prices of real estate have doubled in the past two years. Over \$20,000 changed hands for real estate in 1887. There are two very large cotton compresses here which work a greater portion of the year, giving employment to from 125 to 150 hands. A new planing and saw mill has recently been built. There are several oyster packing establishments, an electric light and power company, a hosiery factory and several other enterprises.

The purchase of the East Tennessee, Virginia & Georgia Railroad Co. by the Richmond & Danville will bring a large quantity of cotton here from the Southern States, and West Point will be a large cotton shipping port. She now ranks sixth in the United States as a cotton port. The educational advantages here are unusually good. We have two large female seminaries. The public free schools are well provided for and under the control of experienced and accomplished teachers; besides there are several private schools in the town. The people and the town authorities both are anxious to see new enterprises come into our midst, and all strangers may be assured that they will be well received and courteously treated by the citizens of West Point. To manufacturers let me say that West Point affords peculiar shipping advantages. Freight is cheap, being made so by the number of steamship lines which ply between this port and Northern cities. Fuel can be obtained easily and at small cost. Labor is abundant and cheap. Thousands of people in the adjoining counties are just spoiling for a job, and the manufacturer will find everything to his advantage.

ISAAC DIGGS.

Where to Look to Find a Good Thing.

COLUMBUS, GA., Jan. 10, 1888.

Editor Manufacturers' Record:

The Franziska Mining Co. was formed in November. We have applied for charter and bought machinery for the mining of yellow ochre on the Marietta & North Georgia Railroad, in Pickens county. This company is composed of Walker Bros., real estate brokers, of this city, and Kristian Korrigard, of Minneapolis, Minn., who own the entire property and will develop the property at once. This company also recently purchased 30,000 acres of timber and mineral lands in North Georgia, in Fannin and Murray counties, which they will develop at once, or sell. Through the judicious mentioning of our operations in your popular journal we have already had applications for the entire output of our ochre mine, although we have not begun work. This only shows that when the public wants to find a good thing they look in the MANUFACTURERS' RECORD. We thank you and your excellent Southern correspondent, Mr. Helper for the substantial aid you are giving to our Southern country. No matter what you may say about the advantages of our country, it is better still. Its wealth of soil, climate, timber, minerals and good will are not to be measured by words. We welcome every good man and woman, and wish the MANUFACTURERS' RECORD unbounded success. WALKER BROS.

A Change in Policy

"Fall River manufacturers, in discussing the labor situation and the outlook for a peaceable culmination of the agitation now in progress on the wage question," says the Providence Journal "called attention to the change which has gradually been made in mill machinery and which eventually is destined, it is believed, to free them from much of the trouble to which they are subjected. It may not be generally known that, in Fall River at least, mule spinning is slowly but surely becoming a process of the past. For the last seven years improvements in nearly all the factories have included, among other things, the substitution of frame for mule spinning. The old mules are thrown out, and the space they occupied is taken by frame spindles. So far as the latter are now in use, they may be said to be entirely devoted to warp spinning, though in two or three factories they are employed upon both warp and filling. The prejudice which agents first entertained against this innovation has disappeared, and it has been found by experience that the comparatively new method is superior to the old in every particular. There is less waste, and no higher grades of cotton than those commonly purchased here are required. The following figures, prepared by members of the Board of Trade, show the change which has been made in this direction from 1880 to 1886: In 1880 there were 779 mule spinners employed in the city. The number of mule spindles was 978,228, and the frame spindles numbered 213,332. In 1886 there were 734 mule spinners at work, and the number of mule spindles in operation was 911,232, a falling off of 66,996 spindles, despite the large increase in the plant for a period of six years. But the tendency to put in frame spindles is more clearly indicated by the fact that the number of frame spindles in 1886 was 688,292, 474,960 more than in 1880, or over three times as many in 1886. The improvements made during the past year, notably at the Granite and Mechanics' Mills, would still further add to the number of frames. The treasurers affirm that they have been led to make this substitution for mule spinning mainly because of the attitude assumed by the members of the Spinners' Union. As now constituted, the latter organization is in

a position to dictate terms, not only to the manufacturers, but to all the other operatives of the city. The weavers may be willing and anxious to continue work, but everything depends upon the action taken by the Union, and if its decree says the machinery must be stopped, all hands are obliged to fall into line. The frame spindles are operated by young men and girls, and serious strikes have thus far been out of the question in factories which are independent of male spinners."

Heavy Universal Milling Machine.

The Universal Milling Machine which we illustrate admits of a greater range of work, and the manufacturers say "it will do work that can be done on no other Universal

long, and provided with easy means of adjustment for wear. The front end of the spindle is threaded on the outside for face plates or face mills. In the spindle is a taper hole for cutter arbors 2 inches diameter at the front end, diminishing $\frac{1}{4}$ inch in 12 inches, to 1-16 inches diameter, through which the arbors are driven out by a rammer.

The cutter arbor supporting bar, with its adjustable center, can be moved out to support cutter arbors 26 inches from the end of the spindle or pushed back out of the way, thus facilitating the milling or boring of a large piece of work that would be prevented by the ordinary fixed bar.

The three feeds, vertical, horizontal (in line with spindle), and transverse (at right angles to spindle), are all reversible, and are operated or stopped altogether by the hand-

knee. A vertical stud passes upward to the long screw in the platen, and is connected to it by clutch mitre wheels. The screw in the platen is splined, and can be engaged or disengaged by a clutch lever, not shown in the cut, but convenient to the operator. In addition, there is an automatic stop for the horizontal feed, useful for boring. These stops can be set at any point.

The platen is 48 inches long, 14 inches wide, and has three slots for $\frac{3}{4}$ -inch bolts on the top, and on the edges two slots. The latter are very useful and convenient. The platen has a transverse feed of 32 inches and a horizontal feed of 12 inches. It can be turned completely around and fed in line with the spindle. It has an automatic stop while feeding in either direction, and is secured by four $\frac{3}{4}$ -inch bolts in the swivel base, of easy access with a wrench.



HEAVY UNIVERSAL MILLING MACHINE.

milling machine." It is specially designed for use in railroad shops, and for builders of locomotives, portable and stationary engines. In repairs to locomotives, where duplication of wearing parts is so frequent, it is particularly valuable on account of its great capacity. For machine tool builders and general machine shops it is very valuable, as work can, it is said, be done to better advantage and with greater precision than on planers, lathes, shapers, etc.

The gearing is internal, all running parts having oil tubes and being accessible for oiling. This machine is back-gear, 4 to 1, and is driven by a $3\frac{1}{4}$ -inch belt on a 4-step cone, of which the largest diameter is 13 inches.

The spindle is of steel and runs in Atlas bronze boxes. The front bearing is $3\frac{1}{2}$ inches in diameter by 6 inches long; back bearing 2-9-16 inches diameter by 5 inches

dle shown in the cut near the cup-board board. This reversing device is common to engine lathes; does away with the crossing of belts and saves time. The 4 step cone on the spindle belts to the lower cone, the shaft of which runs in a hollow stud and drives, by means of the reversing device referred to above, a shaft running through the base of the column. Bevel gears connect this shaft with the vertical shaft, and the latter by bevel gears with the horizontal shaft in the knee, which communicates in turn with the several screws for the various feeds in the front of the knee by clutch gears. These clutch gears can be engaged or disengaged at will by the knurled knobs shown in front, giving a vertical or horizontal feed. The platen feed is operated from the upper shaft in the knee by means of a pair of mitre wheels running in a bearing which is a part of the platen slide on the

The knee is so designed and constructed as to withstand all strains liable to be brought upon it. It is gibbed, with a loose gib on the face of the column, gripped with four $\frac{3}{4}$ -inch stud bolts, and has a bearing 24 inches long and 14 inches wide. In addition, there are two slots, running the whole length of the column, for $\frac{3}{4}$ inch bolts. The two bolts in these slots secure the knee to the face of the column, making it absolutely rigid.

The feed gearing is well protected from dirt, and the mechanism not liable to disarrangement. All gears are of steel, while the bevel gears are cut theoretically correct. The screws are also of steel and accurately cut. The dials read in decimals, or divided by 2, 4, 8, etc., enabling any measurement to be made. Weight of machine about 6,000 pounds. The manufacturers are Pedrick & Ayer, 1095 Hamilton street, Philadelphia, Pa.

The "Queen City" Press.

The accompanying illustrations show the "Queen City" press ready for use, and when taken apart to be cleaned. This press is adapted to many uses, and will be found very valuable to hotels, restaurants and druggists, for pressing berries, fruits, vege-



FIG. 1.

tables, meats, tinctures, etc., as well as in families. The manufacturers make the following broad claims for it:

"The best press known for jelly, wine, catsup, lard, cheese, corned beef, etc.

Extra strong iron stand and frame. More easily cleaned than any other.

The only press that requires no fastening.



FIG. 2.

The only press having so powerful a screw.

The only press that has brass for screw to work through, so that it cannot rust. Other presses have the screws run through cast-iron, and threads are liable to break and soon wear out.

'Queen City' press is galvanised, and the cylinder retinned.



FIG. 3.



FIG. 5.



FIG. 4.

The only press that has legs long enough to admit a large pan being put under to hold material or juice.

The only press so constructed as to have tension continue for a long time after the operator stops turning the screw."

This press is manufactured by the Shepard Hardware Co., of Buffalo, N. Y.

SHEFFIELD

◆ COLBERT COUNTY, ALA. ◆

The Iron Manufacturing Center of the South.

BEING at the head of navigation, and on the south bank of the Tennessee river, Sheffield is the natural outlet for the mineral and manufacturing products of Alabama and neighboring States seeking a water route to points on the Ohio and Mississippi rivers, and to the Gulf of Mexico, as well as the best distributing point over Alabama, Eastern Mississippi and East Tennessee, South Carolina, Georgia and Florida for Northern and Western produce, groceries, provisions, machinery, &c. Four railroads certain, and several others assured. Principal shops of Memphis & Charleston Railroad will be erected here pursuant to written contract. These will employ between four hundred and five hundred mechanics, and consequently, with their families, will make an increase in population of at least two thousand people. Shops of three other railroads are contracted to be located here.

◆ Five Blast Furnaces Now Under Construction, ◆

Of which one is nearly finished, and the remaining four contracted to completion next spring, have estimated capacity of 700 tons pig iron per day. This is 40 per cent. more than now manufactured at Birmingham, Alabama. Experts do not hesitate to say that iron can be manufactured more cheaply at Sheffield than at Birmingham, and its river transportation facilities will enable Sheffield iron to reach the principal markets at a saving of from

\$2.00 TO \$2.50 PER TON.

A first-class semi-weekly newspaper, printed by steam, is regularly issued. Furniture Factory, Bottling Works, Bakery, 3 Steam Brick Works, 2 Hand Brick Works, 2 Steam Wood-Working Establishments, Water Works, 2 Banks, a Savings Bank, and Steam Job Printing Office already in successful operation, and Iron Pipe Works, 15-ton Ice Machine and five-story hotel, with all modern appliances, will be erected. The Cleveland Hotel, Park House and numerous boarding houses furnish accommodations to travelers. Postoffice, Telegraph Office and Express Office already established. Contracts have been made for the early erection of Electric Light Works, Paint Works, Agricultural Implement and Machine Works and Cotton Compress. Large Stove Works, Machine Shops, additional Iron Blast Furnaces, an extensive Charcoal and Chemical Plant, a large Rolling Mill and other manufacturing establishments under consideration, and will probably be built shortly.

Good Water. Free Public Schools and Churches. Health and Climate Unsurpassed.

Drainage excellent. Splendid opening for men of push and energy. No "Old Foggy" element here.

No better point for profitable investment.

◆ Sites for Manufacturing Enterprises, ◆ And for Free Public Schools and Churches

Donated by Sheffield Land, Iron & Coal Company.

Population January 1st, 1887, 700; now, (August 21st, 1887,) by actual count, 2,583. Increase of population, 300 per cent. in eight months, and only limited by accommodations.

Three years ago the site of Sheffield was cultivated as corn and cotton plantations, and was without a railroad. Numerous two and three-story brick business houses, and one and two-story dwellings have been, and are being erected. The class of buildings will compare favorably with those in cities of 20,000 inhabitants.

LIMESTONE of excellent quality for fluxing iron in unlimited quantities at the furnaces' sites. First-class building stone and brick clay abundant. Rich and extensive deposits of brown hematite iron ore within twenty miles, along the lines of two Sheffield railroads. The Sheffield & Birmingham Railroad runs through the heart of the Warrior Coal Fields, which abound in first-class coking, steam, gas and grate coal. Timber is abundant and cheap.

The Memphis & Charleston Railroad and the Sheffield & Birmingham Railroad are now in operation into Sheffield. The Louisville & Nashville Railroad Co. is now extending its Nashville, Florence and Sheffield division, which will be completed to Sheffield before the close of the year 1887. Surveys of three other railroads have been recently completed to Sheffield, which will soon be the best combined river and railroad transportation center in the South.

Every merchant and every established manufacturing enterprise is doing a profitable business. More are needed. For further information address

ALFRED H. MOSES, Vice-Prest. and Manager

Sheffield Land, Iron & Coal Co., - Sheffield, Ala.

Tuskaloosa, Ala.

— * ALABAMA'S NATURAL PITTSBURGH. * —

A Railroad & River Town of 6,000 Inhabitants, in the Coal, Iron and Timber District.

Healthful Location. Salubrious Climate. School Facilities Unequaled by any other town in the South.
Centre of Education for the State. Seat of University of Alabama. Of State Insane Asylum. Of Alabama Central Female College.
Hill's Female School. Fine Free School. Churches of all Denominations.

"EXAMINE THE MAP."

— + SITUATED ON + —
Queen & Crescent

— TRUNK LINE, —

IN THE
Warrior Coal Field

AND ON THE
WARRIOR RIVER.

Only Navigable River touching the
Alabama Mineral Field.

Night Months Navigation. Being Surveyed
now to be opened all the year round.
All Water Navigation to

❖ **MOBILE** ❖

AND THE
Entire Gulf and Atlantic Coasts.

— THE —
Tuskaloosa Northern Railroad

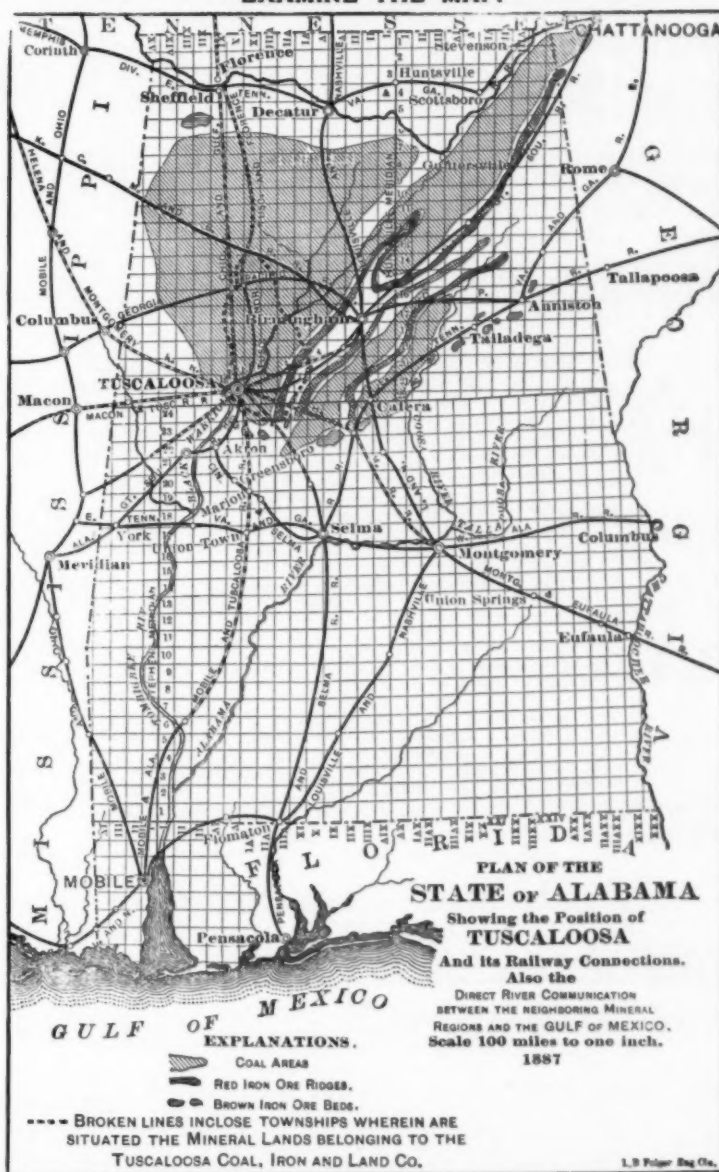
Is now under construction into the
MINERAL and TIMBER FIELDS.

— THE —
Macon & Tuskaloosa Railroad

Will soon be building into the
COTTON REGION OF MISSISSIPPI.

Fine Farming Region

Around and Below the City.



Superior Inducements

AND

+ ADVANTAGES +

TO ALL

Manufactories Consuming
WOOD,
IRON,
COTTON.

FINE COOKING COAL

In workable veins near city, fully tested.

❖ **The Fire Clay** ❖

Existing in inexhaustible quantities, has been
practically tested and pronounced

The Best yet Discovered in the South.

Street Car and Dummy Lines

NOW BUILDING.

❖ **Water Works and Electric Lights** ❖

TO BE PUT IN AT ONCE.

COTTON MILL

In Successful Operation.

ALSO

LARGE BRICK WORKS

COTTON-SEED OIL MILL, &c.

Manufacturers Seeking Locations in the South have here



THE GOLDEN OPPORTUNITY.



Many have availed themselves of it, but such is the wonderful richness of the resources of this section that there is

— * ROOM FOR ALL. * —

THE Tuskaloosa Coal, Iron & Land Co.,

Owning 4,600 acres of city and suburban property, and 40,000 acres of mineral and timber lands, offers liberal inducements to manufacturers
to locate at Tuskaloosa, Nature's City, and invites correspondence and the fullest investigation of its claims.

An illustrated descriptive pamphlet sent free upon application to

W. C. JEMISON, President Tuskaloosa Coal, Iron & Land Co., **TUSKALOOSA, ALA.**

Florence, Ala.

County Seat of Lauderdale County.

At Head of Navigation on Tennessee River, and at Foot of Muscle Shoals Canal,
which will be open Jan. 1st, 1888.

SITUATED on a gently undulating Plateau, 200 feet above high-water mark, surrounded by three large creeks of pure free-stone water. It has a Court House, Two Colleges, Four Public Schools, Six Churches, beautiful wide streets, graded and graveled, and shaded with forest trees; Hotels, fine store houses, Masonic, Odd Fellows, K. of H. and L. of H. lodges. A population of 2,500—moral, social and hospitable.

— The Scenery on Every Side is Picturesque and Beautiful. —

SO MUCH SO THAT IT IS CALLED BY VISITORS

==== FAIR FLORENCE. ” =====

There is no Place on the Continent more Healthful and Salubrious.

MANUFACTURES.

Within the last six months numerous manufactures have been located here, among the number:

Five Large Blast Furnaces.
One Rolling Mill,
Three Planing Mills,

One Saw Mill,
One Flour Mill,
One Wooden-Ware Factory.

One Cotton Mill,
One Cotton Compress and Ice
Factory.

Two Brick Machines and
Three Hand-Brick Yards.

There are VAST BEDS OF IRON ORE within a few miles North and
IMMENSE COAL FIELDS SOUTH

ACCESSIBLE BY RAILROADS NOW BEING RAPIDLY CONSTRUCTED.

By the 1st of January the Nashville & Florence Railroad will be completed, making three lines of railroad, and the river, thus opening up **VAST AREAS OF TIMBER, IRON ORE, COAL, Marble, Limestone, Kaolin, Fire-Clay,** and almost every kind of mineral and product.

THE LANDS IN THE SURROUNDING COUNTRY ARE FERTILE AND PRODUCTIVE.

All kinds of Grain, Grasses and Fruits grow to perfection. Springs and Water Courses are numerous, and grazing for Cattle is abundant for eight months of the year.

Pamphlets and maps furnished on application to

Florence Land, Mining & Manufacturing Company.

GADSDEN, ALA.

Is situated on the West Bank of the COOSA RIVER, in the midst of the

RICHEST IRON AND TIMBER SECTION

IN THE FAVORED STATE OF ALABAMA.

➤ The Gadsden Land and Improvement Company ➤

Own large tract of Eligibly Located Residence Property in the Most Desirable Part of the City, and have fine location on river and railroad for

MANUFACTURING ESTABLISHMENTS,

And are offering great inducements to manufacturers to locate their plants in this *FAVORED LOCALITY*. No place in the South has such **Wonderful Advantages**. Situated in the midst of the *RICHEST IRON SECTION in the STATE*, at the foot of Lookout Mountain on the banks of a Navigable River, (*THE BEAUTIFUL COOSA*.) surrounded by Forests of the Finest Timber on the Continent, with Fine Building and Fire Clay, and the *FINEST BUILDING STONE* all around us, with

Uninterrupted Health, and the Purest and Best Water and Finest Drainage of any City in the State,

Gadsden should become the Greatest Manufacturing Center of Alabama.

THE Alabama Great Southern, Rome & Decatur, Tennessee & Coosa, Anniston & Cincinnati Railroads, with the ever-flowing Coosa navigable the year round, gives us as *FINE TRANSPORTATION FACILITIES* as any other city enjoys.

We now have Railroad Car Works, Furnaces, Foundry and Machine Works, Saw Mills, Sash, Door and Blind Factory, Furniture Factory, Ice Factory, Paint Mills, Grist and Flouring Mills, Cotton Ginnery, Fine System of Water Works, Electric Lights, Telephone Communication over City, and also to neighboring cities Atlanta and Rome, Ga.

WE WANT Rolling Mills, Bridge and Bolt Works, Cotton Factories, Woolen Mills, Furniture Factories, in fact all kinds of Factories, even Coffin Factories, (but we want to ship the Coffins to some of the other booming cities.)

Liberal Grants of Land will be made by THE GADSDEN LAND AND IMPROVEMENT CO. to any of the above-named industries.

FOR FURTHER PARTICULARS ADDRESS

M. L. FOSTER, Sec. & Treas.

THE GADSDEN LAND & IMPROVEMENT CO. - - GADSDEN, ALA.

POST-OFFICE BOX 145.

ANNISTON, ALA.

"The Model City of the South."

THERE is no healthier or more charming place of residence in America than Anniston; built on the slope of one of the highest of the chain of the Blue Ridge in Alabama, it commands scenery that is unapproachable in the State. Nature could not have formed a more beautiful place for man to build a city or given greater natural advantages. The natural drainage is most thorough and complete, while in addition the city is preparing a system of underground sewerage. *A more delightful and invigorating climate cannot be found anywhere: mild in winter, cool in summer, a thousand feet above the Gulf, with the high and broken chain, range after range in the east, Blue Mountain in the north, Coldwater Mountain in the southwest, make Anniston the coolest, healthiest and most attractive of any city in the South.* It has the richest agricultural country surrounding and tributary to it in the State, to support a manufacturing and mercantile population. The mountain sides will grow the grape and every kind of large and small fruit to perfection, and the valleys every product of diversified farming. *It is in the heart of the richest mineral district of the South, and commands the great fields of brown hematite ores on which the great and successful manufacture of iron must in the end depend for quality and profit in every branch of most skillful and best manufactures of iron and steel.* It has tributary to it the best and most extensive pine forests in North Alabama, that are reached by roads owned and controlled by Anniston citizens, while it has secured to its industries the very best coal mines and coking coal in Alabama. There is no city in America, in proportion to population, that has the manufactures of Anniston, or employs as many working men, or does a larger mercantile business. The industries already in full and profitable operation in Anniston are the two Woodstock Furnaces producing six hundred tons of Standard Car Wheel and Malleable Iron per week, and the two Clifton Furnaces, tributary to Anniston, producing nearly as much more. The Car Works are fully employed turning out forty cars per week, and are introducing new machinery and larger engines to increase their capacity to twenty cars per day. The Rolling Mill and Car Wheel Foundry and Steam Forge are among the largest in the South, of a capacity of two hundred wheels, a consumption of 120,000 pounds of metal per day, exclusive of the Rolling Mill and Steam Forge. These works are being enlarged to meet the increasing demands upon them. The Cotton Factory is one of the largest in the South, containing 11,700 spindles, and is running to its full capacity, while the foundry of Murray & Stevenson, and machine shop of Pindar & Co., and planing mills of Miller & Smith and Farrar & Co. employ a large number of men and are crowded with work. The new industries that are now under way and provided for will within the next twelve months add four thousand additional working men to Anniston's population. Two of the Largest Iron Furnaces in the South, capable of producing two thousand tons of iron per week, are progressing rapidly, and one of the Largest and most complete Pipe Foundries in the world for the production of Gas and Water Pipe is under construction,—it will employ nine hundred men.



NOBLE STREET—ANNISTON.

The Steel Bloomery, for the production of Steel Blooms, is nearly completed, and the new Fire-Brick Works of Taylor & Sons are in operation. The Ninety-Inch Morse Cotton Compress, with its warehouses, has been completed, and is receiving cotton. Forty thousand bales, it is estimated, will be secured to Anniston from the territory that its system of railroads have opened up. The completion of the Anniston & Cincinnati Railroad during the present year, that will be owned and controlled by Anniston's citizens, opens up new territory and forms a New and Shorter Grand Trunk Line to Cincinnati and the great Northwest, and to the Southwest via New Orleans and Shreveport.

It is only the profits of business and labor that can add to the wealth of a community, add to or maintain the value of real estate, and add to the prosperity of its people. Having this in view, every industry and business in Anniston is established on a profitable basis. All its merchants are doing a large and profitable business, far larger than they prepared for or anticipated; it is the same with the manufacturers, while not a dollar of debt has been created, either by issue of a bond or placing of a mortgage on any of its old or new industries, leaving their earnings free from fixed charges that must be paid in times of depression as well as of prosperity. To the investor, either in business, manufacturing or real estate, nowhere else are presented opportunities as safe, secure and certain as at Anniston, or where they can rest on as healthy and solid foundation. It has trunk line railroad communication with all parts of the United States, and freight rates with the most favored of Southern cities. Two lines of railroads are owned and controlled in the interest of Anniston by its own citizens. It has the best system of Water Works, with the purest well water from three hundred feet below the surface, drawn from white quartz sand and gravel, and distributed through the city, with a pressure of 100 pounds to the inch, from a reservoir always full, protecting the city against fire and giving it the lowest rate of insurance. The city is practically free from debt, and taxation limited to one-half of one per cent. The means for education are the very best. Public Schools of a high grade are provided. One of the finest and best institutes for Young Ladies has been opened, and a College for Boys and Young Men, to which a School of Technology and Chemical Assay Laboratory have been added, is now nearly completed, and the best of teachers and professors secured for both. There are Churches for all denominations, and Hotel Accommodations that are not surpassed in Europe or America. The ANNISTON INN provides the quiet and comfort of the most luxurious home. The streets are wide, macadamized, and rolled hard and smooth for pleasant drives. STREET CARS AND DUMMY LINES are being built to different parts of the city, and the ELECTRIC LIGHT service enlarged and improved, leaving nothing undone to promote the comfort of its citizens and maintain and increase the value of their property and profits of their business.

The Anniston City Land Company, or the Bureau of Information, will give any information desired when applied to, and invite all wishing a charming place in which to live, to do business or to make profitable investments, to visit

ANNISTON.

CONSTRUCTION DEPARTMENT.

WE PUBLISH, every week, a list of every new factory, of whatever kind, projected anywhere in the South; every railroad undertaken, and every mining company organized. This information is always fresh, and, by enabling manufacturers to correspond with the projectors of such enterprises before their supplies of machinery have been purchased, is of great value. Manufacturers will find it to their interest to read this department carefully each week.

ALABAMA.

Anniston.—Work will at once be commenced on the buildings for the Barbour Machine Works, lately reported as to be moved from Eufaula to Anniston. The machine shop will be 40x80 feet; foundry 50x100 feet; workshop 40x100 feet; warehouse 50x120 feet, &c.

Anniston.—S. J. Rund is organizing a stock company to establish a vinegar and mineral water factory. He has ordered machinery. A similar factory will be started at South Pittsburg, Tenn., by the company.

Anniston.—George Hanson, of Union Springs, has let contract for a store building on Tenth street.

Anniston.—The Twelfth Street Baptist Church are having plans prepared for a brick or stone church. E. D. Willett can probably give information.

Anniston.—Samuel Noble, D. T. Parker and others have organized the West Anniston Land & Improvement Co.

Anniston.—It is rumored that a company will be organized to build tool works at Anniston, and at Chattanooga, Tenn.

Anniston.—A planing mill will be built at South Anniston by Brock & Gwinn.

Anniston.—Jacob Adams, of Darien, Ga., contemplates erecting a large two-story brick building on Tenth street.

Anniston.—H. M. Pierce, of Nashville, Tenn., has been negotiating for the erection of the charcoal furnace and chemical plant referred to last week, but negotiations have been stopped for the present. Arrangements will probably be made later in the year.

Atalla.—G. W. Frost, of Bristol, Tenn., has been prospecting with a view to starting a shoe factory.

Autaugaville.—The factory reported last week as probably to be put in operation is a cotton factory. Its capacity is 2,200 spindles. James Nunn can give information if anything is done.

Birmingham.—New repair shops have been erected at the Sloss furnaces.

Birmingham.—It is stated that a company will be formed to develop ochre mines in Fayette and other counties.

Birmingham.—Messrs. Oates, of Pelham, will erect a large building on Twentieth street.

Birmingham.—The Winkly Printing Co., R. C. Winkly, manager, have started a printing establishment.

Birmingham.—The Elyton Land Co. will greatly enlarge their tack factory which has just been put in operation, and add machinery to manufacture wire nails and pins.

Birmingham.—The Birmingham Tool & Implement Works will hold a meeting February 11 to consider increasing their capital stock to \$200,000.

Birmingham.—The Birmingham-Ensley Land & Improvement Co. have organized the Birmingham-Ensley Building & Loan Association to build houses, &c.

Birmingham.—W. R. King, of Columbus, O., has, it is reported, been prospecting with a view to establishing a fence factory.

Birmingham.—The contract to erect the Powell school building, previously reported, has been let to Mr. Scully at \$38,485.

Birmingham.—The contract to build the 10 miles of turnpike road lately reported has been let to M. G. Kennedy at \$38,927.70.

Birmingham.—Grading has been commenced on the Coal creek extension of the Kansas City, Memphis & Birmingham Railroad.

Birmingham.—The Gamewell Fire & Telegraph Alarm Co., of Richmond, Ind., have contracted to put in a fire-alarm system and have commenced work.

Dadeville.—E. White has purchased and will develop the Parmalle gold mine.

Decatur.—The Alabama Lumber & Fruit Packing Co. is being organized by H. C. Higman, Geo. E. Smith and N. B. Hall, who now have factories at Benton Harbor, Mich., and New Albany, Ind., which will be moved to Decatur and consolidated. Will manufacture fruit boxes, bass ets, &c.

Decatur.—Jesse H. Dickson will erect two store buildings.

Decatur.—The Methodist Episcopal Church, Rev. J. G. Johnson, pastor, will build a church.

Decatur.—A cotton mill will probably be built by parties from Lowell, Mass. The Decatur Land, Improvement & Furnace Co. can give particulars when anything is done.

Decatur.—The Chicago parties reported last week as contracting to build gas works to cost \$200,000 will soon begin work. The Decatur Land, Improvement & Furnace Co. can give information.

Fort Payne.—Fire brick and common brick works are to be established by a company now operating at Raleigh, N. C., of which J. D. Whittaker is superintendent.

Girard (P. O. Columbus, Ga.)—There is talk of converting the guano factory into a cotton factory with a capacity of 200 looms.

Leeds.—It is reported that a party is negotiating to establish extensive lime works. If anything is done the Leeds Land & Manufacturing Co. can probably give information.

Leeds.—A street railroad is being agitated. Stewart & Ricketts can probably give information if anything is done.

Lively.—There is talk of a knitting factory being erected.

Livingston.—The report last week that L. M. Foulk, of Aurora, Ind., will build a sash, door and blind factory is incorrect.

Mobile.—John T. Milner, of New Castle, Ala., will, it is reported, erect a saw mill near Mobile.

Mobile.—Robert Middleton will rebuild his cotton pickery reported last week as burned.

Montgomery.—New York capitalists have purchased the Montgomery Southern Railroad and will, it is said build the road through to Chattahoochee, Fla., at once.

Montgomery.—It is probable that a \$100,000 stock company will be formed to rebuild the Montgomery Flour Mills, previously reported as burned. The proposed daily capacity is 400 barrels.

Montgomery.—It is reported that Walruff & Son are negotiating for the removal of their brewery from Lawrence, Kan., to Montgomery.

Montgomery.—The farmers contemplate organizing a stock company to build a cotton warehouse.

Montgomery.—The Citera Shoe Factory is to be moved from Calera to Montgomery.

Notasulga.—W. D. & J. Barrow will develop the mineral paint on their land. Will want machinery.

Opelika.—L. F. Dickson will erect a store building and wants to purchase an iron front, plate glass, sash, doors, windows, &c.

Opelika.—Z. Hellman will erect a paint mill and wants to purchase machinery for crushing ore and paint and for grinding the same.

Oxanna.—A church will be built by the Cumberland Presbyterian Church, of Anniston.

Selma.—Some new machinery has been put in the Excelsior Bottling Works.

Talladega.—There is talk of building a cotton mill. If anything is done the Talladega Land & Improvement Co. can give particulars.

Troy.—Gellerstedt Bros. will start a clothing factory.

Troy.—The Pike County Guano Co. have increased their capacity and will add a rock and bone mill and acid tanks at once.

Troy.—Water works are being agitated. If anything is done J. M. Henry can probably give information.

Tuscumbia.—The Tuscumbia Contracting Co. has been organized.

ARKANSAS.

Arkadelphia.—The name of the company lately mentioned as being formed to build a cotton mill is the Arkadelphia Cotton Mills. The directors are S. R. McNutt, J. C. Saunders, J. L. Beirne, W. J. Rowe, R. J. Hine, J. W. Garrison and R. F. Cook.

Boonsboro.—A stock company is being formed to start a canning factory by S. T. Cole and others.

Brinkley.—The Batesville & Brinkley Railroad Co. (office, Little Rock) will change their road to standard gauge and build a branch to Portia.

Coal Hill.—Stiwell & Co. contemplate opening new coal mines.

Coal Hill.—The Quita Coal Co. contemplate opening new coal mines soon.

Fort Smith.—The Northwestern Parlor Suite Co., of Chicago, Ill., will build the furniture factory lately reported. They will commence work within 30 days, and will have a capital stock of \$20,000.

Fort Smith.—Bids for building the sewerage system reported last week will be received until February 7 by E. McKenna. The estimated cost is \$150,000. James P. Bates is engineer.

Fort Smith.—F. G. Triesch & Bro. will manufacture cigars.

Hico.—The name of the company reported last week as being organized to erect a canning and evaporating factory is the Hico Canning & Evaporating Co. The capital stock is \$6,000. C. Slagle is president.

Hot Springs.—It is stated that Chicago (Ill.) parties will erect a 40-ton smelting plant and are prospecting for a site. R. R. Waitz can give particulars.

Hot Springs.—It is reported that E. A. Shippey is making arrangements to erect a smelting plant.

Little Rock.—Bryce & O'Kelly will build an iron foundry and have been donated a site.

Little Rock.—Wiegel & Wilson will erect a plant of machinery at their stone quarries.

Little Rock.—A saw factory has been started by George Stringer, of Seymour, Ind.

Little Rock.—Aaron Bales has, it is said, sold 40,000 acres of timber lands.

Monticello.—Efforts are being made to organize a company to start a woolen mill. The capital stock will be about \$10,000. R. F. Hyatt can probably give information.

Portia.—The contract to build a court-house for Lawrence county has been let to Boone & McGinnis, of Hickman, Ky., at \$9,350.

Prairie Grove.—The capital stock of the company previously reported as being formed to start a canning and evaporating factory is \$25,000. W. R. Irvine is secretary of the company.

Searcy.—The Searcy & West Point Railroad Co. are negotiating for heavier rails for their road and will use steam power.

Thornton.—A church and a school are reported to be built. G. W. Pearson can probably give information.

FLORIDA.

Auburndale.—The Episcopalians will build a college.

Clearwater Harbor.—A saw mill will be erected.

De Faniak Springs.—The Methodists will build a \$4,000 church.

Gainesville.—The building of water works is being discussed. B. C. Drake can give information when anything is done.

Jacksonville.—The Florida Palmetto Works contemplate adding the manufacture of matting and bagging for cotton bales and want to purchase suitable looms.

Ocala.—It is stated that a railroad will be built from Ocala to Lake Apopka, 3 miles, at a cost of \$24,000.

Orlando.—The name of the \$20,000 company lately reported as being formed to raise and manufacture tobacco will be the Orange County Tobacco Planting & Manufacturing Co.

Palatka.—There are prospects of a cigar factory being started. If anything is done the secretary Board of Trade can give information.

St. Augustine.—It is rumored that plans are being prepared for a large opera house to be built probably by H. M. Flagler.

St. Augustine.—A hospital is to be built. The mayor can probably give information.

St. Augustine.—Messrs. Drysdale and Collee will erect a block of buildings.

St. Augustine.—Mr. Brits will erect a fine residence.

St. Augustine.—Henry M. Flagler will, it is stated, build a church for the Presbyterians.

Tallahassee.—The Tallahassee Gas & Electric Light Co., reported last week as chartered, has a capital stock of \$50,000. They have purchased machinery, but not pipe and fixtures. E. S. Crill is president and W. M. McIntosh, secretary.

Tallahassee.—The Standard Oil Co. will build a warehouse.

Tampa.—L. J. Pender, Pender & Co., reported last week as moving their cigar factory from Key West to Tampa, are occupying a temporary factory until they can erect a brick factory.

Tampa.—Mr. Ghira will erect three brick store buildings; B. C. Leonardi, 5 brick store buildings, and A. Ross, 5 brick store buildings.

Tampa.—It is reported that a sewerage system to cost from \$200,000 to \$250,000 is to be constructed. If true the mayor can give information.

Tampa.—The Plant Investment Co. will build an ice factory and a cold storage warehouse.

Tampa.—Negotiations are being made for the removal of one or more cigar factories to Tampa.

Tampa.—Plans and specifications for the jail reported last week will be received until February 7 by W. F. Givens. It is to be of brick and the cost is not to exceed \$15,000.

Titusville.—It is stated that the ice factory previously reported as probably to be erected will be built.

GEORGIA.

Albany.—J. Regand is preparing to establish a moulding factory.

Americus.—Thorton F. Morrison contemplates starting a canning factory, and wants to purchase machinery.

Athens.—Gantt & Stovall will add a job office to their printing establishment.

Athens.—The Bloomfield Water Power Co. have ordered machinery for their 5,000 spindle yarn mill previously reported.

Atlanta.—The Atlanta Granite Co. and the Southern Granite Co. will consolidate.

Atlanta.—Atlanta reports claim that the Southern Car Works, of Knoxville, Tenn., contemplate moving to Atlanta.

Atlanta.—The Atlanta Journal Co., lately reported as increasing their capital stock from \$15,000 to \$50,000, will put in a new Hoe press.

Augusta.—The Atlantic Coast Line have commenced surveys at Augusta for their railroad previously reported. They are building under the charter granted to the Manchester & Augusta Railroad.

Augusta.—Jesse Thompson has prepared plans for a block of five store buildings, and contractors are now bidding on the work.

Augusta.—The Augusta Theatre Co. have let the contract for building their theatre, previously reported, to Charles B. Allen. He will commence work at once.

Augusta.—W. H. Doughty, Sr., R. P. Sibbey, C. W. Doughty and P. C. Close have incorporated the Close Health Protecting Fertilizer Co. to manufacture fertilizers from human excrement. The capital stock is \$100,000.

Boston.—S. G. Culpepper will move his lumber mill to Boston and build a tram railroad.

Brunswick.—H. B. Plant, of New York, president of the Plant Investment Co., which recently purchased the Brunswick & Western Railway, states that \$600,000 will be spent in the improvements previously reported. Will build a new passenger depot at Brunswick.

Brunswick.—There are prospects of one or two manufactures being started by parties in Savannah.

Brunswick.—An opera house to cost \$20,000 will probably be built. Plans are being prepared.

Canton.—R. L. Gaines will erect a planing mill and a blacksmith shop, and probably other machinery.

Canton.—There are prospects of a large marble mill being erected in the near future.

Cartersville.—The city council contemplate building water works, and have instructed a committee to employ an engineer to make surveys, estimates, etc.

Cartersville.—The Central Mining Co. have leased manganese iron ore lands from the Etowah Mining & Manufacturing Co., and will develop. The company will build a branch railroad.

Cedartown.—The contract to erect a school building has been conditionally let to Clay Bros. at \$5,500.

Cedartown.—It is rumored that the Chattahoochee Brick Co., of Atlanta, have purchased a site to establish branch brick works.

Chauncey.—The Normandale Lumber Co. will change their railroad from narrow to standard gauge.

Covington.—There is talk of a company being formed to erect a cotton compress, a cotton-seed oil mill and a guano factory.

Dawsonville.—Beard & Rickman have started a printing establishment.

Eatonton.—A stock company has been formed to publish a paper, etc. J. B. Reese is manager.

Gainesville.—A cotton compress and a furniture factory are reported to be erected. If true, J. R. Banks can give particulars.

Gainesville.—A hotel is reported to be built by parties from Orlando, Fla.

Griswoldville.—It is reported that J. P. Van Buren will develop his kaolin land and manufacture fire-brick.

Hartwell.—A grist mill will be built near Hartwell by F. B. Hodges.

High Shoals.—It is rumored that Joseph Coates, Philadelphia, Pa., will build a thread mill at the High Shoals.

Macon.—The Thompson-Houston Electric Light Co. have asked for a permit to erect an electric light plant.

McDonough.—Speer & Turner have put some new machinery in their printing establishment.

Milledgeville.—The Methodists will build a new church.

Priors.—D. B. Hamilton, Alfred S. Hamilton, D. B. Hamilton, Jr., Harper Hamilton and associates have incorporated the Etna Furnace Co., capital stock \$30,000, to operate the Etna furnace, lately reported as being put in blast.

Puckett Station.—Camp & Cureton have purchased machinery to manufacture crates, boxes, etc.

Quitman.—It is stated that a canning factory will be established before spring.

Quitman.—A large brick warehouse is to be built.

Rome.—J. P. Rounsaville, Max Meyerhardt, J. King, J. D. Moore, H. B. Parks, F. W. Quarles, Sr., and L. A. Dean are the directors of the building and loan association reported last week as being organized.

Rome.—20 new looms are being added to the Rome Cotton Factory.

Savannah.—The Chatham Machine Brick Co. has been organized to establish brick works, with Edward Lovell as president. Machinery has been ordered.

Savannah.—The Central Railroad & Banking Co. have purchased the property and franchises of the Savannah, Dublin & Western Railroad Co., and will complete a part of the road, if not all.

Savannah.—Samuel J. Whiteside, J. F. Cavanaugh and Louis P. Hart have chartered the Savannah Ice Delivery Co., capital stock \$20,000, to manufacture ice, etc.

Trion Factory.—The Trion Manufacturing Co., lately mentioned as to double the capacity of their cotton factory as soon as the Chattanooga, Rome & Columbus Railroad is completed, contemplate at present changing about one-half their spindles (8458) to the Whittin gravity spindle, adding some cards and other card machines. Have put in automatic sprinklers.

Valdosta.—The city council contemplate building a city hall, engine and market-house.

Vienna.—It is reported that several saw mills have lately been started near Vienna.

Washington.—James A. Benson will erect a bank building.

Waterville.—Terra cotta works are reported as being erected.

West Point.—The Union Milling & Manufacturing Co. will double the capacity of their flour mill.

West Point.—There is talk of building a railroad from West Point to Columbus to develop the water power of the Chattahoochee river.

West Point.—The Baptists contemplate building a church. The Catholics will also build a church.

KENTUCKY.

Carrollton.—A flour mill is being agitated.

Fordville.—The Louisville, St. Louis & Texas Railroad Co. (office, Memphis, Tenn.) have made surveys for a branch railroad to Fordville.

Frankfort.—Bills have been introduced in the legislature to incorporate the Clifton & Reservoir Park Railroad Co., with a capital stock of not less than \$50,000, and John Dresher, John Collier, J. G. Doyle, S. S. Hite and Joseph Huffaker as corporators; the Germania Safety Vault & Trust Co. (Louisville); the Traders' & Builders' Association (Louisville), with J. M. Murphy and others as corporators; the Somerset, Rockcastle Springs & Eastern Kentucky Railway Co., and the Paducah & Hickman Railroad Co.

Hawesville.—Clark Bros., of Cannelton, have leased and will develop coal lands. Are preparing to begin work.

Hopkinsville.—F. L. Ellis & Co. will at once build a 10 ton ice factory.

Lexington.—The Diamond Oil Co., previously reported, have organized with S. G. Sharp as president; Andrew Campbell, secretary, and Watts Parker, treasurer. Will soon begin boring for oil.

Louisville.—The Kentucky Wagon Manufacturing Co. will early in the spring begin work on the buildings proper for their large new factory previously reported. The work shops will be 160x900 feet, boiler and machine room 48x120 feet. Will put in electric lights. The machinery will cost \$35,000.

Louisville.—The Standard Coal & Mineral Co. will develop a part of their coal lands in Western Kentucky. J. T. Gathwright can give information.

Winchester.—Crapsey & Brown, of Cincinnati, O., have prepared plans for the Winchester M. E. Male College, previously reported. It is to be of brick, three stories, 120x145 feet, with a tower 20 feet square and 160 feet high. The cost will be \$30,000.

LOUISIANA.

New Orleans.—An iron foundry will probably be added to the Tulane Manual Training School.

New Orleans.—The Maginnis Cotton Mills, previously reported as to put in additional machinery, will increase their capital stock from \$500,000 to \$1,000,000, and increase the capacity of their mills from 454 looms and 17,000 spindles to 1,000 looms and 40,000 spindles.

Thibodaux.—The Southern Pacific Railroad Company are building an elevator and a wharf.

MARYLAND.

Baltimore.—The contract to furnish the 2,465 tons of cast-iron pipe, lately reported, has been awarded to the McNeal Pipe & Foundry Co., of Burlington, N. J.

Baltimore.—The Furniture Workers' Co-operative Manufacturing Association will move their factory to a new building corner President and Fawn streets. The building cost \$25,000.

Baltimore.—A bill has been introduced in the legislature at Annapolis to incorporate the Cremation Co., capital stock \$15,000. Benjamin F. Horwitz and John R. Rennous are interested.

Baltimore.—J. W. Sindall will build 24 two-story houses on Hoffman and other streets.

Baltimore.—M. H. Marcus, Central avenue and Bank street, will put in 50 horse-power boiler and engine.

Baltimore.—Henry Schaunberg & Son will erect 16 two-story houses and one three-story house at Charles and Heath streets.

Baltimore.—The Madison Avenue M. E. Church will build a church at Clifton.

Baltimore.—The Catholics contemplate building a church at Steelton, near Baltimore.

Baltimore.—J. E. Simpson, of New York, has been prospecting at Locust Point with a view, it is said, to building a dry dock, wharves, &c.

Baltimore.—The Baltimore Press Publishing Co., capital stock \$15,000, has been organized by A. B. Cunningham, Wm. J. Guard and others to publish a daily paper.

Centerville.—Water works are being agitated.

Chestertown.—Wilbur Eliason has recently put additional machinery in his straw board mill.

Denton.—T. F. Garey, Jr., is preparing to build a roller grist mill.

Ellicott City.—Solomon Hose contemplates establishing coopeage works.

Frederick.—T. R. Crane, of Baltimore, is negotiating to establish an agricultural implement factory.

Point of Rocks.—A bridge will, it is stated, be built across the Potomac river near Point of Rocks. Joseph D. Baker, Frederick, can give information.

Port Deposit.—A stock company is being formed to build the iron foundry reported last week.

Rising Sun.—William P. Addison has lately added a band saw to his lumber mill and contemplates putting in a feed mill.

Salisbury.—The Maryland Steamboat Co., of Baltimore, will spend about \$3,000 in improving their wharf property. The contract has been let to George W. Parsons.

Washington, D. C.—Charles Gessford will erect seven dwellings to cost \$15,000.

Washington, D. C.—George Becker will erect four three-story brick dwellings on E street northwest to cost \$12,000.

Washington, D. C.—A bill has been introduced in the United States Senate to authorize the Capital, North O Street & South Washington Railroad Co. to increase their capital stock to \$1,500,000.

MISSISSIPPI.

Greenville.—The Greenville Water Works Co. have purchased 5 acres of land for their plant, previously reported.

Greenville.—The Greenville Brick & Improvement Co. will enlarge their brick works, reported last week, and will start the manufacture of tiles and terra cotta.

Jackson.—Bills have been introduced in the legislature to incorporate the Mobile, Hattiesburg & Jackson Railroad Co.; the Edison Electric Light Co. (Greenville), and the Waynesboro, Pascagoula & Gulf Coast Railway Co.

Macon.—Plans for a brick church to cost not more than \$3,500 and a frame church to cost not more than \$2,500 are wanted by Robert C. Patty. Will pay usual commission for plans that are accepted.

Vicksburg.—Mulholland Bros., reported last week as preparing to rebuild their spoke factory and cotton ginnery, will also build a cotton-seed oil mill.

NORTH CAROLINA.

Asheville.—T. H. Lindsey and George H. Ketchen are starting a printing establishment.

Asheville.—A factory is being built by Grant, West & Co.

Charlotte.—More than \$113,000 have been subscribed towards organizing the Enterprise Manufacturing Co. to build the second cotton factory lately reported. J. H. McAden, W. P. Bynum, M. P. Pegram, H. M. Houston and others are interested in the company. The capital stock will probably be \$200,000.

Charlotte.—It is proposed by John Vandlandingham, F. L. Alexander and others to form a co-operative company with a capital stock of \$100,000 to build the third cotton factory.

Danville.—Wemple, Ellerson & Co. contemplate enlarging their tobacco factory.

Fayetteville.—A corn mill is being erected by W. O. Lockamy.

Fayetteville.—It is stated that the Cape Fear & Yadkin Valley Railroad Co. will build a new depot.

Forest City.—G. E. Young is working up a company to build a cotton factory.

Franklin.—The Nantahala Marble Co., of Atlanta, Ga., previously reported as purchasing the Jarrett marble property, are preparing to make extensive developments. They will build a \$15,000 marble mill, tenement houses, &c.

Greensboro.—A. C. Burgess & Co. contemplate erecting a small mill for manufacturing yarns and carpet warps at Greensboro or Staley, and want to purchase good second-hand machinery complete for a one set mill.

Monroe.—The capital stock of the company reported last week as to be formed to build a cotton factory will be about \$50,000. Walter J. Boylin can give information.

Nashville.—The Mann-Arrington Mining Co. are receiving the new machinery for developing their gold mines, previously reported.

Newton.—One of the shuttle block factories will be enlarged during the year.

Newton.—The New on Cotton Mills contemplate adding machinery during the year.

Oxford.—The tobacco prize factory reported last week as to be built by J. T. Rogers will be four or five stories, 75x125 feet. He will erect it next summer.

Pilot Mountain.—A stock company has been formed to build a tobacco warehouse. Work has been commenced.

Raleigh.—The Observer Printing Co. have started a job printing and book-binding establishment.

Raleigh.—I. M. Proctor & Co. have fitted up a new prize factory.

Raleigh.—It is reported that D. C. Hudgins will build a foundry at Millbrook.

Reidsville.—A meeting of citizens is to be held to consider organizing a company to build a cotton factory.

Reidsville.—Richmond & Palmer will start the broom factory reported last week.

Rutherfordton.—A building and loan association, capital stock \$30,000, has been organized, with L. P. Erwin as president, and T. W. Dixon, secretary and treasurer.

Salem.—A saw mill has been erected 2½ miles from Salem by Fishel & Hege.

Salisbury.—An electric light plant will probably be erected soon.

Salisbury.—J. A. Boyden, M. C. Quinn and A. W. Osborne have formed the Salisbury Brick Co. They have purchased a site and machinery, and will erect works at once.

Shelby.—Wilkinson & Fore will soon begin making the improvements to the Cleveland Springs property, previously reported.

Statesville.—Jacob Mendall will move his cigar factory from Charlotte to Statesville.

Statesville.—The company previously reported as being formed to build a cotton factory has, it is stated, been organized. The capital stock is \$100,000. J. P. Caldwell can give information.

Swann's Station.—The kaolin lands reported last week as probably to be developed are owned by William M. Swann. Negotiations for their development are now pending.

Tarboro.—The capacity of the Tarboro Fertilizer Factory has been increased.

Walnut Cove.—A stock company has been formed to build a school. P. W. Allen can give particulars.

Walnut Cove.—The Stokes Manufacturing Co. will probably rebuild their sash and blind factory lately reported as burned.

Wilmington.—Wilmington parties are forming a company to build a railroad to Wrightsville sound.

Wilmington.—E. K. P. Osborne and Mr. Dixon, of Charlotte, contemplate building a street railroad and a dummy railroad from Wilmington to Wrightsville sound, eight miles.

SOUTH CAROLINA.

Beech Island.—The Franklin Kaolin Co. are erecting works and expect to be shipping clay by March. They will enlarge their works in the summer. Thomas J. Danes is president.

Beech Island.—Thomas J. Danes has purchased two tracts of kaolin lands. He is opening up one tract and erecting buildings, etc., to ship clay. The other tract will be developed during the summer.

Beech Island.—A stave and barrel factory has been erected. Thomas J. Danes can give particulars.

Black Mingo.—F. Rhem & Son, reported last week as re-erecting a saw mill on Black river, contemplate soon building a narrow gauge tram railroad.

Charleston.—Oliver & Carter have commenced work on their contract to rebuild the county jail lately reported.

Columbia.—The Richland Building & Loan Association has been organized with John T. Sloan as president; George K. Wright, vice-president, and William Barnwell, secretary and treasurer.

Georgetown.—The address of Ehrich & Twigg, reported last week as building a saw mill, is Georgetown, and not Aiken.

Greenville.—The Greenville News Co., capital stock \$15,000, is being organized to do a printing and publishing business by John Ferguson, E. A. Smith and others.

Greenville.—Barton & Gilleland will start the manufacture of harness, saddlery, etc.

Mapleton.—The capital of the Mapleton Cotton Mills, owned by Searles & Dallis, will be increased.

Pomaria.—George B. Aull and Theodore N. Kebler will probably start a saw mill.

Summerville.—A company has been chartered to build the hotel reported last week. The capital stock will be about \$20,000 or \$25,000. W. R. Dehon can give information.

TENNESSEE.

Athens.—Mr. R. J. Fisher has been making investigations in regard to erecting a small electric light plant.

Bayless.—B. F. Bashor, of Knoxville, has recently repaired his flour mill at a cost of \$1,200.

Bristol.—J. M. Kunkle, of Pond Gap, Va., has been prospecting with a view to establishing a tannery.

Chattanooga.—It is rumored that a company will be formed at Anniston, Ala., to build tool works at Anniston and at Chattanooga.

Chattanooga.—The Hughes Lumber Co. has been chartered to manufacture agricultural implements, &c., by George E. Drumbar, E. A. Alexander, Robert W. Andrews, Charles Stein and Garnett Andrews.

Chattanooga.—The Hamilton Lumber Co. has been incorporated by George E. Drumbar, F. A. Alexander, Robert G. Andrews, Charles G. Stein and Garnett Andrews.

Chattanooga.—The Hamilton Gas & Oil Co. are preparing to sink another well.

Chattanooga.—The Citizens' Oil & Gas Co. has been organized by O. J. Sheridan and others. The capital stock will be \$150,000. Will sink first well in the Sequatchie valley.

Chattanooga.—Carl G. Thomsen and R. C. Hutchinson will, it is stated, organize a company to build an organ factory.

Chattanooga.—John R. Dean & Co. are corresponding with parties who contemplate establishing an undertakers' hardware factory.

Chattanooga.—The Chattanooga Electric Street Railroad Co., previously reported, have organized with C. A. Lyerly as president; G. N. Henson, vice-president; E. Scott, secretary, and C. V. Brown, treasurer.

Chattanooga.—The Highland Park Land Co. will organize a stock company to build a street railroad.

Chattanooga.—The Chattanooga City Transfer Co., capital stock \$25,000, has been organized with W. H. Hart as president.

Chattanooga.—Amos Tepenaw will build a \$6,000 residence.

Clarksville.—A stave and heading factory is to be started soon.

Clinton.—A land and improvement company is being organized and the capital stock will probably be \$500,000. S. W. Wilson can probably give information.

Dandridge.—The rumor referred to last week that a woolen mill will be established is not confirmed.

Dayton.—A company is to be formed to erect an electric light plant.

Elizabethton.—W. B. Carter, reported last week as purchasing some new machinery for his flour mill, is remodeling the mill.

Gallatin.—The Sumner Hotel, burned in March, 1886, is reported to be rebuilt. J. C. Saunders, of Lebanon, can give particulars if true.

Johnson City.—It is stated that a large steam tannery is to be built and that work will be commenced early in the spring. The mayor can probably give information.

Jonesboro.—A. B. Cummings will start a plow factory and wants to purchase a 6 or 8 horse-power upright stationary engine, new or second-hand, and other machinery.

Kingsport.—A. Gibson has improved his saw mill.

Kingston.—Iron ore lands have been purchased by W. B. Hope, J. H. Welcker, W. L. Welcker, W. Wiley and others.

Knoxville.—J. H. Rumbough has purchased a site to build a tobacco factory.

Knoxville.—The Knoxville Cold Storage Warehouse & Wholesale Commission Co. has been formed by H. N. Camp and others.

Knoxville.—The Knoxville Southern Railroad Co. have purchased 63-pound steel rails for 100 miles of their road.

Lebanon.—John H. Freese will start a steam laundry.

Memphis.—William Stewart will rebuild his burned building.

Memphis.—The Brown Tobacco Co., of Montgomery, Mo., are negotiating for the removal of their chewing and smoking tobacco factory to Memphis. If moved, it will be somewhat enlarged.

Memphis.—The Memphis Water Works Co. will greatly extend their mains during the year.

Memphis.—E. L. Estep is improving the Clarendon Hotel and will put in elevator.

Memphis.—The Memphis Brick & Manufacturing Co., previously reported as increasing capital stock, will put in additional machinery.

Memphis.—A saw mill, dry kilns, &c., will be built near Memphis by J. M. Donnell & Son. The daily capacity of the mill will be 40 M feet.

Memphis.—John Averton will erect a block of buildings to cost \$75,000, and R. B. Snowden a block on Second street to cost \$150,000.

Morristown.—Shields Bros. will, it is said, organize a \$100,000 stock company to develop their marble quarries near Morristown.

Mossy Creek.—J. C. Beeler, J. C. Johnston, Arthur Moody, J. W. Mooney, M. H. Peck and others are interested in the \$15,000 stock company reported last week as formed to manufacture woolen yarn. A site has been secured for the mill, and machinery is being purchased.

Mossy Creek.—It is reported that roller machinery has lately been put in the flour mill of S. G. Saunders.

Nashville.—It is rumored that the Louisville & Nashville Railroad Co. contemplate moving their machine shops to another location and enlarging them.

Nashville.—Liebermann, Lovemann & O'Brien, reported last week as purchasing large new engine for their lumber mill, have purchased band saw mill, additional circular saw mill, three new boilers, &c., and built new factory. The improvements cost about \$30,000.

Oliver Springs.—There are prospects of one or more manufactories being started in the spring.

Pelter.—P. Henderson has started the manufacture of wagons.

Pittsburg Landing.—A railroad is projected from Pittsburg Landing to Corinth, Miss.

Shelbyville.—Cross, Adams & Co. contemplate enlarging their foundry and machine works.

Shelbyville.—The Citizens' Bank will erect a brick bank building and are receiving bids.

Shelbyville.—The hub and spoke factory reported last week has been put in operation by Jacob Garrett and John W. Friereson.

South Pittsburg.—A vinegar and mineral water factory is to be started by a stock company being organized at Anniston, Ala., by S. J. Rund.

Tallahassee.—John L. Collins, reported last week as to start a steam laundry, will start it at Lebanon for John H. Freese. Mr. Collins will add some machinery to his present laundry.

TEXAS.

Austin.—J. F. Pope will make surveys for an irrigating canal.

Blanco.—K. R. Seaton, of Sweetwater, is developing a silver mine 12 miles from Blanco.

Brenham.—The electric light plant lately reported will be erected by the Thompson-Houston Electric Light Co., represented by Mr. Richards.

Dallas.—The Dallas Building & Savings Association, capital stock \$500,000, has been organized with W. E. Parry, E. W. Tower, R. S. Munger and others as directors.

Denison.—The North Texas Loan & Trust Co., capital stock \$200,000, has been incorporated by John R. Carr and others.

El Paso.—J. P. Hague and associates have asked for permit to build a street railroad.

El Paso.—William Crosby and associates contemplate erecting ore sampling works.

Fort Worth.—It is stated that the Montana, Kansas & Texas Railroad Co. contemplate building to Fort Worth.

Fort Worth.—The North Fort Worth Street Railway Co. have increased their capital stock to \$200,000.

Fort Worth.—A \$50,000 stock company is being formed to erect a six-story building, 75x100 feet, for the Board of Trade. The cost will be \$100,000. E. E. Chase or E. S. Gard can give particulars.

Fort Worth.—The county commissioners have appropriated \$33,000 for an iron bridge two miles from Fort Worth, \$19,000 for an iron bridge over a slough and a certain sum towards an iron bridge over the Trinity at Fort Worth.

Gainesville.—Brady Bros. will at once rebuild their flour mill reported last week as burned. The capacity will be 200 barrels.

Galveston.—The school trustees have purchased a site for the school building previously reported, but will probably not build at present.

Georgetown.—Plans and specifications for the jail and jailer's residence, reported last week, will be received until February 13 by W. M. Key. The cost is not to exceed \$30,000.

Greenville.—The Texas Compress Association will rebuild their cotton compress previously reported as burned.

Greenville.—J. M. Cook and Thomas King, of Greenville, and Thomas Howard, Thomas E. Tutt, S. W. Fordyce and others, of St. Louis, Mo., have contracted to build water works.

Hawkins.—T. S. McSpadden will rebuild his saw mill lately reported as burned.

Houson.—William Boyd and associates have received a permit to build a street railroad.

Houston.—The Jenney Electric Light Co., of Fort Wayne, Ind., have contracted to light the city.

Houston.—T. W. Anderson has received permit to erect an electric light plant.

Houston.—W. O. Ellis offers to furnish \$200,000 towards organizing a \$400,000 stock company to build a refrigerator and beef canning establishment if balance is raised at once by other parties.

Huntsville.—Plans for the new courthouse reported last week as to be built by Walker county will be received until February 13 by the county judge. It is to be of brick or stone, and is not to cost more than \$22,500.

Marfa.—J. H. Catlin will develop the Home Stake Silver Mines 30 miles from Marfa.

Marshall.—W. D. Littlefield and others will organize a stock company to erect an electric light plant. Will use the Westinghouse system.

Mexia.—A stock company has been formed to start the canning factory lately reported. J. W. Stubenrauch can give information.

Overton.—Alford & McGilvery and Duglis & Co. will start the canning factories lately reported.

San Angelo.—J. D. O'Donnell will build a 20 horse-power planing mill.

Sweetwater.—N. J. Fritz, A. C. Bawcom, S. D. Brannon, D. C. Davis and others have organized the Sweetwater Mining Co. to develop a silver mine.

Temple.—New York parties have been granted a franchise to build water works and street railroads, and erect an electric light plant, and they will, it is said, commence work at once. The mayor can give information.

Tyler.—The Tyler Electric Light Co. have contracted to light the city and will erect a plant.

Tyler.—The Tyler Canning Co. are building a new and larger canning factory, and have purchased machinery to manufacture their cans.

Weatherford.—The Parker County Farmers' Alliance contemplate building a roller flour mill with a daily capacity of from 75 to 100 barrels. S. T. Davis can give information.

VIRGINIA.

Amherst.—It is stated that a stock company will be formed to start a tobacco factory if the tax on tobacco is taken off by the present Congress.

Amherst.—A land improvement company will probably be formed.

Bonsack's.—J. H. Bartlett is sinking a shaft at the Bonsack zinc and silver mine.

Chatham.—A bill has been introduced in the legislature at Richmond to authorize the mayor and council to issue \$5,000 of bonds to build water works. L. H. Pigg can give information.

Clinch River.—A lumber boom is being constructed in the Clinch river.

Crewe.—A hotel is to be built at a cost of \$10,000.

Danville.—It is rumored that H. Sampson & Co. will move their tobacco factory from Reidsville, N. C., to Danville.

Estillville.—Marble quarries are reported to be opened in the spring.

Harrisonburg.—There is talk of forming a stock company to purchase the mill site of Clem & Wenger and establish a woolen mill.

Harrisonburg.—It is reported that the Baltimore & Ohio Railroad Co. (office, Baltimore, Md.) will build machine shops at some point along their Valley Branch. The city council have appointed a committee to negotiate for their location at Harrisonburg.

Lexington.—A stock company will probably be formed to build a grain elevator and operate in connection with it a saw mill, box factory and a can and canning factory.

Lovely Mount.—The Norfolk & Western Railroad Co. (office, Roanoke) have let the contract for the abutments and piers for the bridge across the New river, previously reported, to John Kelley, of Lynchburg.

Lynchburg.—The Glamorgan Co., lately mentioned as to enlarge their machine works during the year, contemplate doing so at an early day.

Lynchburg.—St. Paul's P. E. Church will erect a new stone church on Clay street, corner Seventh, to cost \$50,000 or \$60,000. H. H. Law, of Washington, D. C., has prepared plans. Work will be started early in the spring.

Lynchburg.—The building of a car works plant is being discussed. T. C. Jones can give information if anything is done.

Luray.—The Episcopalians will build a new church.

Mount Jackson.—A creamery is to be started.

Norfolk.—Thomas R. Ballentine will erect a large store and office building. Plans have been prepared.

Pedlar Mills.—A canning factory will probably be started soon.

Portsmouth.—The Portsmouth Record Publishing Co. has been incorporated. The capital stock is to be not less than \$3,000 nor more than \$10,000.

Pulaski City.—An oil well is being sunk on the land of J. J. Trollinger, seven miles from Pulaski City.

Pulaski Station.—J. H. Tyler and others talk of starting a beef packing establishment.

Richmond.—It is reported that Northern parties will put the James River Brewery in operation.

Richmond.—The capital stock of the Richmond & Eltham Railroad & Navigation Co., a bill to incorporate which was reported last week as being introduced in the legislature, is to be not less than \$5,000 nor more than \$5,000,000.

Richmond.—Bills have been introduced in the legislature to incorporate the Virginia Agricultural & Mechanical Society, capital stock \$120,000; the Elizabeth River Navigation Co., with a capital stock of not less than \$25,000 nor more than \$500,000, and Frederick S. Taylor and others as incorporators; the Spotsylvania Mining & Manufacturing Co.; the Norfolk Fuel & Gaslight Co. (Norfolk); the Virginia Immigration, Land & Improvement Co., (Fredericksburg), with a capital stock of not less than \$50,000 nor more than \$500,000, and R. S. Mason, Walter S. Phillips and others as incorporators; the Fidelity Safe Deposit & Trust Co., (Norfolk); the Roanoke & Franklin Turnpike Co.; the West End Water Co., (Petersburg); the Pocahontas Towing & Transportation Co., with a capital stock of not less than \$20,000 nor more than \$1,000,000, and William Lamb, of Norfolk, and others as incorporators, and the Abingdon Railway Co.

Riverville.—Work has lately been resumed at the iron ore mines near Riverville.

Roanoke.—The Home Conveyancing Co. has been chartered to purchase lands and build and sell houses. The capital stock is

to be not less than \$5,000 nor more than \$100,000. R. L. Terry is president.

Staunton.—A grain elevator is projected. J. C. Shields, secretary Chamber of Commerce, solicits correspondence with parties who can furnish plans, estimates, &c. The capacity is to be from 50 to 75 M bushels.

Staunton.—A cigar factory has been started by George H. Haines & Son.

Staunton.—The capital stock of the Augusta Agricultural & Machine Works will be increased.

Tazewell C. H.—N. W. & M. L. Peery contemplate starting a broom factory, and want to purchase all machinery needed except power.

Tazewell C. H.—A canning factory will probably be started soon.

University of Va.—The Board of Visitors of the University of Va. have decided to light the grounds and buildings with electric lights.

Warrenton.—Bethune & Jeffries contemplate starting an apple evaporating factory next autumn.

WEST VIRGINIA.

Beverly.—The Tygarts Valley Boom & Lumber Co. has been incorporated by Thomas A. Bradford, T. P. R. Brown, James A. Bent, L. D. Strader and George W. Leonard, of Beverly, and others. The capital stock is limited to \$150,000.

Charleston.—Robert Bartley, of Washington, Ga., is prospecting with a view to purchasing coal lands.

Falling Waters.—The flour mill of Mrs. E. Z. Stahley, reported last week as burned, will be rebuilt.

Guyandotte.—Stewart Bros. will add to their woolen mill one set cards and spinning machine, twister and blanket loom.

Huntington.—The Davis Flour & Bolt Co. has been chartered to manufacture flour mill machinery by J. L. Caldwell, J. T. Miller, Jr., J. V. Davis, E. B. Enslow and F. B. Enslow. Have purchased machinery. The subscribed capital stock is \$10,000.

Huntington.—The Ohio River Railroad Co. (office, Parkersburg) will build their road to Huntington, erect a freight depot, &c.

Huntington.—J. M. Hambleton will move his marble yard from Catlettsburg, Ky., to Huntington.

Kearneysville.—A creamery is to be started.

Kingwood.—James R. Smoot, of Newburg; A. J. Bonafield, Tunnelton; W. M. O. Dawson, J. A. Martin, William G. Brown and William G. Worley, of Kingwood, and others have incorporated the Kingwood Coke Co. to mine coal, manufacture coke, bricks, &c. The capital stock is not to exceed \$50,000.

New Martinsville.—New York and London (Eng.) capitalists are negotiating for 16,200 acres of coal lands in Wetzel county.

New Martinsville.—It is stated that work on the railroad from Fairmont to New Martinsville will be commenced soon. It will be 51 miles long.

Parkersburg.—C. E. Batson, F. E. King, Ina Skervin, M. F. Batson and William E. Skervin have incorporated the Parkersburg Brick & Tile Co. to manufacture bricks, tiles, &c., and engage in merchandising. The authorized capital stock is \$10,000.

Parkersburg.—The Butcher & Beeson Cigar Manufacturing Co. has been incorporated by M. A. Butcher, B. F. Butcher, W. P. Beeson, B. M. Beeson and L. N. Tavener. The capital stock is \$5,000.

Wheeling.—It is reported that the Wheeling Hinge Factory has lately been enlarged.

Wheeling.—The Baltimore & Ohio Railroad Co. will shortly begin double tracking their road from Glenwood to Wheeling.

Wheeling.—The Wheeling & Pittsburgh Junction Railroad Co., capital stock \$50,000, has been incorporated by F. M. Hildebrand, of Baltimore; William M. Clements, Henry M. Russell, M. Reilley, Thomas O'Brien and John G. Hoffman, of Wheeling, and others.

Wilsonia.—L. Levering, reported last week, has lately opened a vein of cannel coal 6 feet in thickness.

BURNED.

Abbeville, La.—The grist mill and gin of John A. Brookshire; loss \$4,000.

Birmingham, Ala.—The furniture factory of Morris & Norton.

Denison, Texas.—The round house of the Missouri Pacific Railroad Co.; loss \$100,000.

Farmersville, La.—The saw mill, grist mill and gin of W. H. Hearn, 6 miles from Farmersville.

Fernandina, Fla.—The machine shops of Florida Railroad & Navigation Co. Will probably be rebuilt.

Georgetown, S. C.—The turpentine distillery of Mr. G. Carraway, on Black river.

Grantville, Ala.—The flour mill of Mr. Miller.

Linwood, Ala.—The mill of Hugh Downing, near Linwood, wrecked by a boiler explosion.

McComb, Miss.—The dry kilns of J. J. White.

Orlando, Fla.—The planing mill of Copeland, Starbird & Co.; loss \$3,000.

Walnut Cove, N. C.—The dry kiln of Kay Hill.

The gins of J. K. Hanley, 20 miles from Pine Bluff, Ark.; F. F. Stearns, Pioneer Mills, N. C.; R. J. Reinhardt, Iron Station, N. C.; W. C. P. Huffman, near Jena, Ala., and J. H. Alderman, Quitman, Ga., have been burned.

Developing Kaolin Lands.

BEECH ISLAND, S. C., Jan. 12, 1888.

Editor Manufacturers' Record:

I have purchased two tracts of land, five miles apart, on which remarkable deposits of kaolin have been discovered. One of these is now being opened and large buildings with equipment of teams, wagons, carts, etc., are being built and at work. It is proposed to have the product in market in March and extend the works to great proportions. The other will be developed the coming summer. In addition to the above, the Franklin Kaolin Co., recently organized under a charter from South Carolina, are erecting works on a large scale and expect to produce fine clay ready for shipment by 1st March. The main shed is being rapidly pushed. The works will be extended the coming summer. The writer has been elected president of the company. Altogether the outlook for the production of all the fine clay needed for the trade is particularly good. The clays recently found are the finest and most extensive in the South. As the writer has been a successful shipper of clay for twenty years he feels confident it is not asserting too much to make such a statement. It is a very important discovery for this section. There has been recently—ten days ago—completed by a Southern mechanic, born and reared in this county, a stave and barrel mill, turning out first-rate casks for shipping clay. It is entirely a new enterprise, induced by the demand for casks at the Beech Island Clay Works and the developments above referred to.

THOS. J. DAVIES.

Will Build Street Railroad.

HUNTINGTON, W. VA., Jan. 14, 1888.

Editor Manufacturers' Record:

I will build a street car line in the spring. The Ohio River Railroad will build their road from Guyandotte to this city in the spring also. J. L. CALDWELL.

MACHINERY WANTED.

[If you desire to purchase machinery of any kind consult our advertising columns, and if you cannot find just what you wish send us particulars as to the kind of machinery needed. We will make your wants known free of cost, and in this way secure the attention of machinery manufacturers throughout the country. You will thus get all information desired as to prices, etc.]

Broom machinery is wanted by W. W. & M. L. Peery, Tazewell, C. H., Va. Have water power.

Canning Machinery.—S. F. Cole, Boonsboro, Ark., wants information as to the cost, capacity, &c., of machinery for a canning factory.

Canning Machinery is wanted by Thornton F. Morrison, Americus, Ga. He wants information as to labels.

Engine.—A. B. Cummings, Jonesboro, Tenn., wants to purchase a 6 or 8 horsepower stationary upright engine, new or second-hand, pony planer, drilling machinery to drill from 1/4-inch to 1-inch holes emery wheels, light band saw, &c.

Estimates on new and second hand machinery for manufacturing cotton-seed oil, fertilizers, &c., are wanted by W. R. Burgess, Greensboro, N. C.

Fire Escapes.—The school commissioners of Washington, D. C., will again advertise for proposals for furnishing fire escapes.

Good second hand machinery complete for a one-set mill for manufacturing coarse yarns and carpet warps is wanted by A. C. Burgess & Co., Greensboro, N. C.

Grain Elevator.—J. C. Shields, secretary Chamber of Commerce Staunton, Va, wants to correspond with parties who can furnish plans, estimates, &c., for a grain elevator of from 50 M to 75 M bushels capacity.

L. F. Dickson, Opelika, Ala., wants to purchase an iron front, plate glass, sash, doors and windows for a building which he will erect.

Looms.—The Florida Palmetto Works, Jacksonville, Fla., want to purchase looms suitable for manufacturing matting and bagging for cotton bales

Machinery for developing a mineral paint mine is wanted by W. D. & J. Barrow, Notasulga, Ala.

Ore Crushers.—Z. Hellman, Opelika, Ala., wants to buy ore and paint crushers and mill to grind the same.

Proposals for furnishing and erecting six steel boilers, 66 inches in diameter and 18 feet long, at the pumping station near Nashville, Tenn., will be received until February 2 by George Reyer.

Steam Heat.—Proposals for putting in the courthouse and postoffice at Macon, Ga., a low pressure return circulation steam-heating and ventilating apparatus will be received until February 7 by Will A. Freret, supervising architect, Washington, D. C.

Tools.—Proposals for furnishing tools and materials for the navy yard at Portsmouth, Va., will be received until March 1 by the Secretary of the Navy, Washington, D. C.

Building Planing Mill.

TALLAPOOSA, GA., Jan. 13, 1888.

Editor Manufacturers' Record:

I am putting up a planing mill and machinery for making weather-boarding to be put in operation at once. Capacity 10 M to 15 M feet per day. J. C. JACKSON.

Building Railroad.

ISELL, ALA., Jan., 13, 1888.

Editor Manufacturers' Record:

The Isbell & Iron Mountain Railroad Co. was organized December 29th, 1887, with C. H. Castle, of Quincy, Ill., president; J. B. Boyd, Quincy, Ill., vice-president; S. A. Blasland, treasurer, and J. E. Isbell, general manager. Work has already begun on the road. It will be six miles long and will connect Isbell and the iron fields of this county. J. E. ISELL.

To Build Jail and Iron Bridge

TAMPA, FLA., Jan. 13, 1888.

Editor Manufacturers' Record:

The county commissioners of Hillsborough county will have constructed during this year a brick jail at Tampa, and an iron bridge across the Hillsborough river at Tampa. W. A. GIVENS, Clerk.

RICHMOND, VA., Jan. 12, 1888.

Editor Manufacturers' Record:

I and others have formed the Virginia Mining & Manufacturing Co. BASIL B. GORDON.

Opened Vein of Cannel Coal

WILSONIA, W. VA., Jan. 16, 1888.

Editor Manufacturers' Record:

We have lately opened a vein of cannel coal six feet in thickness. It is of very fine quality, yielding 13,000 cubic feet of high candle-power gas to the ton. There is also another vein of cannel coal on this property not yet opened, and a vein of soft gas coal not yet opened. Lying above the cannel coal is an enormous quantity of clay iron-stone in many veins, alternating with veins of excellent coal, and two veins of limestone. No definite arrangements have yet been concluded for the development of the property. L. LEVERING.

The Cotton Factory for Lynchburg.

NEW YORK, Jan. 14, 1888.

Editor Manufacturers' Record:

The subscriptions (cash) to Lynchburg (Va.) cotton mill now amount to \$200,000, and it looks now that we can raise it to \$250,000; at any rate will try. On my return will organize and make a start as early as possible. M. GUGGENHEIMER, JR.

Remodeling Flour Mill.

FAYETTEVILLE, TENN., Jan. 13, 1888.

Editor Manufacturers' Record:

We are completely rebuilding our mill to a first-class roller mill, capacity 100 barrels per day, on the Case system. Will be in operation in ten days. Have one of the finest water-power locations in Tennessee; can furnish 3,000 horse-power. Any persons wishing to start cotton factory here we will offer inducements to them. BEARDEN, THOMAS & SHAFNER

SMITH MINES, }

(P. O., BIRMINGHAM) ALA., Jan. 14, 1888. }

Editor Manufacturers' Record:

J. R. & C. J. Smith have now opened three mines—No. 1 at Fasel; No. 2 at Ware, and No. 3 at Reader's Gap. They have contracted to furnish 1,500 tons per day of ore. This is the largest ore contract in the South. They have two twelve drill Sargent compressors, two 80 horsepower engines to run their crushers, two Jumbo No. 4 crushers, and will employ from 1,000 to 1,200 men in all. They have 182 tenement houses, besides houses for foremen, &c., two commissaries, and carry about \$10,000 stock in them. In fact, they have quite a little town built up. Everything is new and is just started to work. A. J. TERRELL.

To Start Canning Factory.

PRAIRIE GROVE, ARK., Jan. 11, 1888.

Editor Manufacturers' Record:

A canning and evaporating company, with a capital of \$25,000, has just been organized with the following named gentlemen as directors, viz: D. F. McMillan, E. G. McCormick, I. F. Flood, J. J. Baggett, S. D. Hardy, Wm Mitchell, John O. Parks, W. R. Irwin, secretary. B.

Contemplate Building Tram Railroad.

BLACK MINGO, S. C., Jan. 10, 1888.

Editor Manufacturers' Record:

We are now putting up a steam saw mill; the size will be 25 horse-power with improvements. We also erected last fall a large store here, and an improved steam gin and grist mill. We are contemplating building a tram narrow gauge road to open up a large pine forest at an early date. F. RHEM & SONS.

Will Build a Large Church.

LYNCHBURG, VA., Jan. 13, 1888.

Editor Manufacturers' Record:

We propose to build a handsome new Gothic church on Clay street corner of 7th. Material of stone; seating capacity between 700 and 800. H. H. Law, of Washington, D. C., architect. Hope to break ground in the early spring. T. M. CARSON, Rector St. Paul's Church.

REIDSVILLE, N. C., Jan. 11, 1888.

Editor Manufacturers' Record:

A broom factory will be started by Richardson & Palmer. P.

CARTERSVILLE, GA., Jan. 13, 1888.

Editor Manufacturers' Record:

The Cartersville Furnace Company has not been organized fully. We make no announcements until on a sure footing. The Central Company is mining and shipping iron ores pronounced by the Chattanooga furnaces to be the best received at that place. This company owns some of the most valuable mineral lands and leases in this country. It will soon build a branch railroad and do business on a large scale. No stock is for sale, but the company will extend substantial aid to any one wishing to put up furnaces, foundries or factories, having valuable sites and powers for these purposes. JOHN W. AKIN.

RISEING SUN, MD., Jan. 12, 1888.

Editor Manufacturers' Record:

I placed in my mill one No. 2 band saw for the purpose of cutting heavy rims in connection with the bending of all kind of carriage and sleigh goods, making this line of work complete. I contemplate putting in a feed mill to run by an iron wheel this coming season. Purchased band saw from Cordesman & Meyer, Cincinnati, O. WM. P. ADDISON.

Electric Light Plant to be Erected.

REIDSVILLE, N. C., Jan. 11, 1888.

Editor Manufacturers' Record:

We will begin on the lights after the 1st of February, and will commence on a big scale to improve the town in other needed improvements. The largest tobacco box factory and lumber mill in North Carolina is just finished. C. I. LEWIS.

Enlarging Pencil Factory.

CEDAR KEY, FLA., Jan. 10, 1888.

Editor Manufacturers' Record:

F. A. Wolfe & Co are enlarging their cedar pencil factory and adding new machinery. The F. R. & N. Railway will extend their track to the ice factory now about to be put in operation, for the purpose of furnishing transportation for fish, oranges and vegetables put in cold storage at this point. JAS. O. ANDREWS.

Will Rebuild Mill.

FALLING WATERS, W. VA., }
Jan. 13, 1888. }

Editor Manufacturers' Record:

I will rebuild my flour mill E. Z. STEHLEY.

To Build Hotel at Anniston.

ANNISTON, ALA., Jan. 12, 1888.

Editor Manufacturers' Record:

It is my intention to organize a company to build a down town hotel to cost about \$50,000. Have about one-half of the stock taken. R. H. CONN.

Will Erect Sugar Mill.

HUNTSVILLE, TEXAS, Jan. 12, 1888.

Editor Manufacturers' Record:

We will erect during the year and in time for present year's crop, a sugar mill on State convict farm on Oyster creek, in Fort Bend county, Texas, with capacity to take off 50,000 pounds sugar in 24 hours. Have 560 acres in cane. THOS. J. GRUBB, Supt. Texas Penitentiary.

TULLAHOMA, TENN., Jan. 9, 1888.

Editor Manufacturers' Record:

I have been corresponding for some laundry machinery for Mr. Jno. H. Freese, of Lebanon, Tenn., as I am to start it up for him and run it till he learns to run it himself. I am going to add some machinery to my laundry by spring. JNO. L. COLLINS.

BALTIMORE, MD., Jan. 13, 1888.

Editor Manufacturers' Record:

We will remove to corner President and Fawn streets in two weeks. Cost of building \$25,000; engine and machinery to be put in will cost about \$10,000. Will employ about 75 hands, and expect to do a business of about \$75,000 to \$90,000 a year. Our present average is \$50,000. Are now established 19 months, having been incorporated June, 1886.

FURNITURE WORKERS

CO-OPERATIVE MFG. ASSO.

PERRY, GA., Jan. 9, 1888.

Editor Manufacturers' Record:

The Perry Variety Works have ginned 370 bales the past season. They have just contracted to manufacture the wood work to 12,000 bales for the Perry Manufacturing Co. They will add a planer and several smaller machines. Would like the address of a practical broom maker, to whom they will give employment, and as soon as such arrangements are made will put in broom machinery. E. J. FULLER, Man.

Machinery Wanted.

NOTASULGA, ALA., Jan. 14, 1888.

Editor Manufacturers' Record:

We expect to develop the mineral plant on our land at an early day as practicable, and expect to need machinery for working it with. W. D. & J. BARROWS.

Water Works Contemplated.

CARTERSVILLE, GA., Jan. 14, 1888.

Editor Manufacturers' Record:

Our city fathers have taken the matter of water works in hand and say they intend to build to this end. They have appointed a committee with instructions to employ a competent engineer to make surveys, estimates, &c. D. W. K. PEACOCK.

Canning and Evaporating Factory.

HICO, ARK., Jan. 11, 1888.

Editor Manufacturers' Record:

There is a company organized here with a capital stock of \$6,000 for the purpose of building a canning and evaporating factory. The officers are: C. Slagle, president; Sam. Box, vice-president; Felix Miller, treasurer, and R. G. Raven-croff, secretary. This factory will be in operation by June 1, 1888. It is styled the Hico Canning & Evaporating Co. SAM. BOX.

Mississippi Notes.

Agricultural and Manufacturing Items.

[Special correspondence MANUFACTURERS' RECORD.]

ABERDEEN, MISS., January 14, 1888.

A new banking company was organized at Water Valley, on the 9th inst., to be called the 'People's Bank.' All of the prominent business men of the town and several Oxford capitalists are interested in the new enterprise.

Mr. J. H. Parnell, late of Ireland, brother of the distinguished Home Rule leader, has located at Crystal Springs, Copiah county where he will establish one of the most extensive fruit and vegetable farms in the South.

A twenty-acre plat adjoining Greenville is being laid off into town lots.

Aberdeen, Kosciusko, and other towns claim that every house within their limits is occupied.

Lawrence county boasts that there are no outstanding warrants against her treasury, and that it holds a surplus to the credit of all the county appropriations.

The Jackson Clarion and the State Ledger, of the same city, have consolidated under the name of the Clarion-Ledger. This makes one of the strongest interior publishing firms in the Gulf States.

The members of the Lincoln County Horticultural Club, at their meeting in Brookhaven last week, adopted the novel but excellent plan of entering into a written contract in which each man bound himself to cultivate a stipulated area in certain kinds of fruits or vegetables for export.

The Messrs. Smith, who farm three miles east of Brookhaven, in Lincoln county, made, during the season just closed, 2,000 bushels of corn, 60 bales of cotton, 4,000 pounds of pork, and large amounts of hay and other products. Lincoln county boasts many such enterprising farmers.

The Summit Sentinel says that "J. M. McGhee, of Franklin county, and his seven sons, with no other labor, made 180 bales of cotton last season, besides an abundance of corn, peas, potatoes, molasses, etc." The cotton alone, at \$45 per bale, yielded \$8,100.

The Mississippi State Horticultural Association met at Crystal Springs, in Copiah county, on the 11th inst., with one hundred delegates in attendance on the opening day.

The "piney woods" of Mississippi are wonderfully adapted to the production of all kinds of fruits and vegetables, and there is not a single plant or shrub or tree or vine that will grow anywhere on American soil that will not flourish there.

Commenting upon an item quoted from the Mississippi notes in your issue of December 31st, the Mississippi Daily News says: "The fruit and vegetable industry of Mississippi is yet, it may be said, in its infancy in comparison with what it will eventually become, and it is gratifying to the lovers of progress to know that it is increasing very rapidly throughout the State."

Lands in Copiah county, in the vicinity of Crystal Springs, that were hardly saleable at \$3 or \$4 per acre a few years ago, are now commanding from \$40 to \$50 per acre, owing to the profitable fruit and vegetable industry that has been built up in that vicinity.

The receipts of cotton at Aberdeen for the season commencing September 1st, up to January 5th, amounted to 24,461 bales, against 22,279 bales to corresponding date in 1887. On January 6th the shipments from Aberdeen amounted to 17,174 bales, leaving 7,287 bales in store in her warehouses.

A strong Chicago syndicate proposes to build the projected railroad from Memphis, via Oxford and West Point, to Columbus, if the counties through which it passes will give right of way and small subscriptions. The proposal has been received with great enthusiasm.

The Mulholland Spoke Factory Co., at

Vicksburg, that lost their plant by fire some days ago, has determined to at once resurrect the spoke factory and add a fine cotton-seed oil mill. \$50,000 of the oil mill stock was paid in on the 13th.

The two drying houses with four fine kilns, belonging to J. J. Whites' saw mill, burned on the 12th, destroying about 300,000 feet of dressed lumber and three miles of iron piping. The structures will probably be replaced at an early day.

The shipments of lumber from the port of Pascagoula, on our south coast, for the week ending January 18th were as follows:

	Feet.
To Guayaquil.....	1,051,882
To Liverpool.....	8,84,000
To Tronville.....	309,503
To Buenos Ayres.....	866,440
To Key West, Fla.....	180,858
Total.....	3,746,683
	13,500 shingles.

The above shipments indicate a busy time at the south coast saw mills, incident to the rise in the logging streams that has enabled the mills to get in their winter supply of stocks.

The Pascagoula Star-Democrat predicts that the shipments of fruits and vegetables this year from the coast region to Northern and Western markets will exceed those of any previous season.

WARRENTON, VA., Jan. 14, 1888.

Editor Manufacturers' Record:

In addition to the canneries proposed by two of our citizens for next spring, we are in correspondence with a competent manager in Maryland with the view to establishing here next autumn an extensive apple evaporating plant. If 1888 proves to be a fruit year, the fine orchards of Fauquier can furnish the best apples for the purpose and in great abundance.

BETHUNE & JEFFRIES.

Enlarging Lumber Mill.

NASHVILLE, TENN., Jan. 13, 1888.

Editor Manufacturers' Record:

We have purchased one band saw mill, one additional circular saw mill, one Corliss engine, three new boilers and built a new factory, expending about \$30,000 in improvements, etc., now going on.

LIEBERMAN, LOVEMAN & O'BRIEN.

Brick Works to be Started.

FORT PAYNE, ALA., Jan. 13, 1888.

Editor Manufacturers' Record:

The company which proposes to manufacture fire and building brick at this place is one which has been in the same business at Raleigh, N. C., and intends moving to this place. J. D. Whitaker is the superintendent of the works and transacts the business.

THOS. H. SMITH.

Furniture Factory to be Built.

FORT SMITH, ARK., Jan. 9, 1888.

Editor Manufacturers' Record:

Our citizens have donated 3½ acres of valuable ground to a furniture factory from Chicago, known as the Northwestern Parlor Suit Co., but just who the men and officers are that compose the company I am unable to say at present. Their capital stock will be \$20,000, and they agree to employ, from and after the first year, from 125 to 150 men. They are to commence work within the next 30 days.

R. H. ADAIR, Sec. Cham of Commerce.

Contemplate Enlarging Works.

MARSHALL, TEXAS, Jan. 11, 1888.

Editor Manufacturers' Record:

The Marshall Gas Light Company contemplate in the coming summer to add another holder of gas to its present capacity. Hope we may succeed in erecting one to fully supply the demand.

W. C. PIERCE, Sec.

OIL CITY, PA., Jan. 13, 1888.

Editor Manufacturers' Record:

The Hulings Lumber Co. are building a boom at Hendricks, W. Va., and will build mill here the coming spring. The company has about 3,000 acres land near this point, with a boom at the mouth of Cheat river, where their present mills are. But if the West Virginia Central Railroad will give favorable rates a large quantity of the company's lumber will be manufactured at Hendricks; otherwise they will drive their timber through to slackwater navigation on the Monongahela river.

H. L. Co.

Enlarged Cotton Mill.

SHELBY, N. C., Jan. 14, 1888.

Editor Manufacturers' Record:

We have built an annex to our mill, 30x50 feet, for machinery. We are running day and night.

MILLER, BLANTIN & OATES.

Cotton Mill Machinery Wanted.

GREENSBORO, N. C., Jan. 16, 1888.

Editor Manufacturers' Record:

We think of erecting a small mill at Staley or Greensboro, N. C., for manufacturing yarns and carpet warps. Will probably use second-hand machinery if can be suited in quality and price.

A. C. BURGESS & CO.

DENISON, TEXAS, Jan. 12, 1888.

Editor Manufacturers' Record:

The Denison & Sherman Railroad Co was incorporated January 6, 1888. It provides for the construction of a line of road from Denison, Texas, to Sherman, the object being to secure a closer connection between the Denison & Washita Railway, now building to the coal fields, with the St. Louis, Arkansas & Texas and the Texas & Pacific Railway systems. The headquarters and general office of the road will be at Denison. It is expected that construction will be commenced at an early date. The first board of directors are: Edward Perry J. B. McDougall Paul Waples. Sam Hanna J. T. Munson. E. H. Lingo. J. R. Carr, A. F. Platter and W. B. Munson.

W. B. M.

Erected Saw Mill.

MEMPHIS, TENN., Jan. 15, 1888.

Editor Manufacturers' Record:

We have erected a saw mill for cutting quartered oak, and have it in operation; also operate cotton gin of 120 saws. Capacity of saw mill 30 M feet per day. Machinery built by Sinkler, Davis & Co., Indianapolis, and Atlas Engine Works, of same place. Business good; ready sale for the product of our mill.

COOPER & BODMAN.

Plans for Church Wanted.

MACON, MISS., Jan. 14, 1888.

Editor Manufacturers' Record:

I desire to receive plans for brick or frame church to be erected by Presbyterians at this place, cost not to exceed \$3,500 for former or \$2,500 for latter. The usual commission will be paid for plan that may be adopted.

ROBERT C. PATTY.

To Build Gas Works.

TALLAHASSEE, FLA., Jan. 14, 1888.

Editor Manufacturers' Record:

The Tallahassee Gas & Electric Light Co. is organized with a capital of \$50,000, and will build gas works at once. The plant has been secured, but we have not yet purchased pipe and fixtures. The officers are E. S. Crill, president, and W. M. McIntosh, Jr., secretary.

W. M. MCINTOSH, JR.

JUST before going to press, we are in receipt of a copy of the Durham (N. C.) Recorder, edited by the same individual who edits the new paper there, called the Southern Tobacco-nist and Manufacturers' Record, to which reference was made in our columns last week, and also on our first editorial page to-day. The Recorder claims that it did not receive a copy of the MANUFACTURERS' RECORD containing our warning to the public, and indulges very freely in Billingsgate, the usual refuge of such people, but it forgets to mention that its editor had received a letter, calling his attention in very plain terms to this swindle, in attempting to pirate the name of the MANUFACTURERS' RECORD, even to the style of letters used. This letter was mailed January 5, but has received no answer. As stated on our first editorial page, the imitation is carried so far as even to imitate the peculiarity of the letter "M" which begins our heading. To deny this is folly, as an examination of the two headings would convict the individual doing so of being a liar.

Negotiating for Cotton-Seed Oil Mill.

DECATUR, ALA., Jan. 7, 1888.

Editor Manufacturers' Record:

I have negotiated for the erection of a cotton seed oil mill, and expect to conclude the bargain within a week, but the contract has not been signed as yet.

DECATUR LAND, IMP. & FURNACE CO.,
H. G. BOND, Gen'l Manager.

THE Woman's World improves with every number and that for February is particularly interesting. The frontispiece is a portrait of the Princess of Wales in her academic robes as a doctor of music. "Medicine as a Profession for Women" is the subject of a paper by Mary A. Marshall, M. D. The "Greek Plays at the Universities" are described by a Girton girl. Following this is a paper on Alexander College, Dublin, which was founded by Mrs. Jellicoe, who was its first president. The literary and other notes by the editor, Mr. Oscar Wilde, are more literary than otherwise, but they are all conspicuous for that easy style and cleverness for which Mr. Wilde is famous. The discussion of the month's fashions is left to the end of the magazine. There are London fashions and Paris fashions and pictures of Sara Bernhardt's costumes in her new play. Cassell & Co. New York publishers.

Baltimore Stock Exchange Quotations

Reported by ALEXANDER BROWN & SONS, Bankers, Baltimore.

BALTIMORE, Jan. 18, 1888.

	BID.	ASKED.
Virginia 6's Consols C.....	40½	40
Virginia 3-4's 10-40's.....	35	35
Virginia 3's new.....	53½	54
Virginia Consol Coupons.....	24½	25
Virginia 10-40 Coupons.....	20	20
N. Carolina 4's.....	95	95
N. Carolina 6's.....	120	121
Atlanta & Charlotte.....	51½	53
Charlotte, C. & Aug.....	23	23
Wil., Col. & Aug.....	112	112
Wil. & Wel., 5's.....	122	124
Wil., Col. & Aug. 6's.....	118	118
Atlanta & Char. 1st. 7's.....	119½	120
Col. & Green. 1st 6's.....	101½	101½
Col. & Green. 2d 6's.....	76½	78
Va. Midland 4th. 3-4's.....	117½	118
Va. Midland 5th 5's.....	72	72
Va. Midland 5th 5's.....	101	101½
Char., C. & Aug. 1st. 7's.....	109	109
Char., C. & Aug. 2d. 7's.....	111	111
Ga. Pacific 1st. 6's.....	106½	108
Ga. Pacific 2d. 6's.....	47	47
Western N. Carolina Cons'd 6's.....	88	93
Cape Fear & N. Valley 6's.....	94½	96

Will Improve Cotton Mill.

TRION FACTORY, GA., Jan. 9, 1888.

Editor Manufacturers' Record:

The matter of increase in the capacity of the Trion Manufacturing Co's mill is under advisement. The immediate improvement that is now in contemplation will be the changing about half the spindles to the Whiting gravity spindle, the adding of some cards and other card machinery. Have just completed a system of automatic sprinklers throughout the mill.

TRION MANUFACTURING CO.,
G. B. MYERS, Sec. and Treas.

Additional Machinery.

ROME, GA., Jan. 12, 1888.

Editor Manufacturers' Record:

We are putting 20 new looms in our mill in addition to what we put in last spring.

C. E. McLIN,
Sec'y Rome Cotton Factory.

Canning Factory.

BRUGH'S MILL, VA., Jan. 13, 1888.

Editor Manufacturers' Record:

I have bought my machinery, and will put up can goods next season; capacity on tomatoes 7,000 to 10,000 cases. R. BRUGH

Electric Light Plant.

BRENHAM, TEXAS, Jan. 12, 1888.

Editor Manufacturers' Record:

A Mr. Richards is now in the city perfecting arrangements to introduce the Thompson Houston electric light, which he expects to have in operation by the 15th of March.

J. G. RANKIN.

Will Rebuild Flour Mill.

GAINESVILLE, TEXAS, Jan. 10, 1888.

Editor Manufacturers' Record:

We will rebuild at once; capacity 200 barrels.

BRADY BROS.

Will Rebuild Compress.

GREENVILLE, TEXAS, Jan. 6, 1888.

Editor Manufacturers' Record:

Greenville Cotton Press will be rebuilt.

G. D. RAMEY, JR., Gen'l Man.

Laundry for Anniston.

TULLAHOMA, TENN., Jan. 9, 1888.

Editor Manufacturers' Record:

We are going to start a laundry at Anniston, Ala., by the first of February.

TOPE & BACHELDER.

To Develop Kaolin Lands.

CHARLESTON, S. C., Jan. 6, 1888.

Editor Manufacturers' Record:

We will organize a kaolin company in a few days, named the Imperial Kaolin Co. of South Carolina; capital stock \$150,000.

GEO. A. WAGENER.

To Develop Coal Lands.

FORT WORTH, TEXAS, Jan. 10, 1888.

Editor Manufacturers' Record:

We are going to build our road to the coal fields of Jack and Young counties this year. We have purchased and leased a large acreage of coal lands, and will develop them during this year.

FORT WORTH & WESTERN R. R. CO.,
W. W. H. LAWRENCE, Pres.

Doubled Capacity.

BIRMINGHAM, ALA., Jan. 11, 1888.

Editor Manufacturers' Record:

We have doubled our capacity of last fall, but it is only carrying out our original idea, and we now have a capacity of 300 boxes per day, in perfect order.

BIRMINGHAM SOAP WORKS.

Contracted to Build Water Works.

LYNCHBURG, VA., Jan. 12, 1888.

Editor Manufacturers' Record:

We have closed contract with the town council of Marion, Va., to build their water works; contract price \$12,000. Work is to be completed on or before July 1, 1888. Have orders on file for six months' work in our various departments, and contemplate enlarging our works at an early day.

GLAMORGAN CO.

Plans for Courthouse Wanted.

HUNTSVILLE, TEXAS, Jan. 9, 1888.

Editor Manufacturers' Record:

Plans are invited to February 13, 1888, for a courthouse for Walker county, Texas, not to exceed in cost \$23,500. Specifications for both brick and stone, in order that contractors may bid for either a brick or stone building.

J. M. SMITHER, County Judge.

Increased Capacity of Factory.

DANVILLE, VA., Jan. 10, 1888.

Editor Manufacturers' Record:

We have increased our capacity from 600,000 pounds tobacco per year to 1,000,000 and over per year.

ARNETT, SNELLING & CO.

Two Canning Factories

OVERTON, TEXAS, Jan. 7, 1888.

Editor Manufacturers' Record:

We are to have two canning factories, and they are to be constructed by responsible men—Messrs. Alford & McGilvery and Duglis & Co.

J. B. HOWER.

Remodeling Flour Mill.

ELIZABETHTON, TENN., Jan. 11, 1888.

Editor Manufacturers' Record:

I have purchased new machinery. I am now remodeling my flouring mill at this place.

W. B. CARTER.

C. R. MAKEPEACE & CO.

ARCHITECTS and MILL ENGINEERS
PROVIDENCE, R. I. Plans, Specifications and Estimates furnished for Cotton and Woollen Mills.

**D. W. K. PEACOCK,
Real Estate Agent,**

CARTERSVILLE, GA.

Minerals a Specialty.

Refers to THE HOWARD BANK, Cartersville, Ga.
J. W. RANKIN, Atlanta, Ga.

Manufacturers' Bureau, of Fort Smith, Ark.

Invite correspondence and propositions from manufacturers with a view to locating at Fort Smith. Fort Smith is the center of an immense semi-anthracite coal, lumber, iron and cotton region, with railroad facilities giving close connections with the markets of Kansas, Texas, Missouri, Indian Territory and Arkansas. Population in 1880, 7,500; in 1886, 14,000; in September, 1887, 18,000.

Rare Chance for an Investment.

The entire property of the COLUMBUS ICE COMPANY, including ample grounds, eligibly located, good buildings, and Machinery in good order. Capacity from 3 1/4 to 5 tons daily. Made money every season. Sold for division. Cash purchaser can get a splendid business bargain.

L. M. TUCKER, President.

**REAL ESTATE IN A
Booming Alabama Town
FOR SALE.**

Three Hundred Choice Business and Residence Lots in the CITY OF ANNISTON.

This property is the best in the city, and having been bought before the boom, will be sold at prices affording investors a rare opportunity to make certain and handsome profits. Address

F. M. HIGHT, Anniston, Ala.

**GREEN FOREST,
Rockbridge County, Va.**

Best location in the State for a Furnace. Vast beds of rich Buena-Vista iron ore at hand. Coke at less than three dollars per ton. Eight acres for a site offered FREE on the S. V. R. and the R. & A. Railroad.

Best location for a Paper Mill. Supply of soft wood unlimited. Two acres FREE for a site.

Best location for a Woollen Mill. One acre FREE for a site. Large water power available. Write to

R. C. MOONAW.

West Point, Va.

A growing town. Property increasing in value. Factories invited. New enterprises exempt from taxation.

Splendidly located on York river.

Steamer lines to Europe, New York—Baltimore, &c.

Oysters and fish in unlimited abundance. Surrounded by the great fruit and trucking country of Virginia. For any particulars desired, address,

E. WILKINSON, MAYOR.

R. H. NEILSON.

E. E. MASTERMAN.

R. H. Neilson & Co.**REAL ESTATE****Abstract Agents****Bond and Stock Brokers,**

Tuskaloosa, Alabama.

Ten years' experience in handling Southern lands. Coal, iron and pine lands a specialty. Refer with permission to F. S. Moody, president First National Bank; J. H. Fitts, president Castle Hill Land Co., and Fitts' Bank.

Office up Stairs, Over Spiller's Store.

Well posted in coal and pine lands.

NOTICE

—TO—

Manufacturers.

Special attention is directed to persons engaged in manufacturing industries to the property of the South Baltimore Harbor & Improvement Co., located at Curtis Bay, about one mile southeast of Light Street Bridge, being the Southern Boundary of Baltimore City and near the extensive Car Works just completed and in operation. Particular notice of manufacturers East and North of Baltimore is called to this locality, which, besides its proximity to the Southern markets, has many advantages, such as railroad and water communications, cheap house rents, easy access to the city, &c., &c. The location is high and healthy, rising to about 160 feet above tide water. For further particulars apply to

WM. S. RAYNER,

Pres. S. B. H. & I. Co.

8 E. Lexington St

BALTIMORE.

**Gallatin, Tenn., Cotton Factory
FOR SALE.**

Factory is situated immediately on Chesapeake & Nashville R. R., and right in city of Gallatin, on L. & N. R. R. Factory has one horse power engine, 136 looms, with sufficient machinery to run the looms to their full capacity; never failing water for all purposes. Machinery all in good running order. All machinery automatic and of latest improved kind. Makes from 7,000 to 7,500 yards of goods per day. Looms 4-6, but arranged to make, when desired, either 3 or 5. There is also attached to factory merchant grist mill; in addition large double brick house, also eleven cottages for operatives. Property cost \$150,000. Will be sold at a bargain. Machinery will be sold separately if desired. There are some 20 acres of land adjoining factory. For particulars address

BANK OF GALLATIN,
Gallatin, Tenn.

Cotton Yarn Mill

At Augusta, Ga.

FOR SALE.

Will be sold at public out-cry, on 7th day of February, 1888, at 12 o'clock, noon, at the Lower Market House, in the City of Augusta, Ga., under regular Administrators' Sale, by virtue of an order of the Court of Ordinary of Richmond County, Ga., the property known as THE SHAMROCK MILLS, situated on and run by water-power derived from the Augusta Canal, consisting of ninety-five hundredths (95-100) of an acre, more or less, of land, together with the Buildings thereon and all Machinery connected therewith, embracing twenty-four hundred and ninety-six (2496) Spindles and all necessary Machinery for the manufacture of Fine Yarns. Automatic Sprinklers throughout. For further particulars apply to Joseph B. Cumming or Charles A. Harper, Attorneys at Law, Augusta, Ga.

C. G. GOODRICH, G. J. FARGO,
J. E. HARPER, J. B. DOUGHERTY,
Administrators on Estate of John Davison.

**A Rare Chance
FOR SALE.**

A well-equipped planing mill. Building, iron and brick. First floor, 80 by 100 feet; second floor, 30 by 80 feet. 40 horse-power engine and boiler, shafting, pulleys, belting, blower, one floor ring machine, two turning lathes, resaw, one 12-inch Fay molder, one endless bed planer, one self-feed rip saw, one swing saw, one iron-working lathe, one hand saw, one scroll saw, one Universal rip saw, one single head shaper, one 4 inch molder, one sander and lot small tools.

All this machinery and building were new two years ago, of most improved patterns, and is in perfect working order, located within 100 yards of the Union passenger depot. It affords a strictly first-class investment. Address

LOCK BOX 566,
MONTGOMERY, ALA.

**SALE OF
Cotton Factory
FLOURING MILL,**

AND OTHER

Valuable Real Estate.

By virtue of a deed in trust, executed to me by A. Hines and wife, M. H. Hines, of Surrey county, recorded in book 1, page 520-521, register's office of Surrey county, on 25th day of June, 1883, I will expose to sale at public auction in Mt. Airy, on WEDNESDAY, the 1st day of February, 1888, the following described real estate, lying in the town of Mt. Airy on the Ararat river, known as the HAMBURG MILLS, containing 4 1/2 acres. On this tract is situated a BRICK COTTON FACTORY, fully equipped with machinery, a VALUABLE FLOURING MILL, SHOE FACTORY, STOREHOUSE, and a number of tenement houses. This is one of the finest water powers in Surrey county. The Mill is within one mile of the railroad, and is one of the finest properties in North Carolina. Terms of sale, cash.

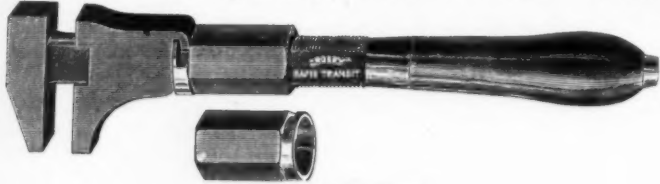
J. C. BUXTON,

Trustee

Dec. 15th, 1887.

The Crosby Rapid Transit Wrench

This wrench, shown in cut, is a recent invention manufactured by The E. H. Pease Manufacturing Co., of Racine, Wis. The strong points to recommend it are its instantaneous adjustment for duty in its rigidity and strength. Can be changed from one size of nut or bolt to any other size instantly—a half-turn of the nut locks the wrench securely; a half-turn back again permits the movable jaw to slide up and down the bar freely. When adjusted the movable jaw remains in its place, no matter what the strain upon it is, while in a great many



RAPID TRANSIT WRENCH.

of the old wrenches a heavy strain will loosen the grip of the wrench. Unlike most wrenches, the "Crosby" wrench takes all the strain directly on the main bar, and not on a supplemental jaw, connected by only a light frame, which is liable to break or tear out under a heavy strain. The construction is such that it is as strong when opened to its fullest capacity as at any other point. In spite of the superior construction and value, these wrenches are sold for only a trifle more than the ordinary monkey wrench. Prices and lowest discounts quoted to the trade.

REFERRING to the death of Mr. Chas. D. Crutchfield, formerly of Baltimore, a son of the editor of the Baltimorean, The American of last Saturday, says: "He was born in Richmond, Virginia, where his father for many years was prominently connected with newspapers. The deceased entered upon his career in journalism in this city, his contributions to The American being among his first efforts. He did not remain long in Baltimore, but became a member of the local staff of the Philadelphia Record soon after that paper was established. Turning his attention particularly to railroad matters, he soon won a reputation in this important line of newspaper work. Making a careful study of railroad, coal and mining interests, few, if any, newspaper men in this country were better posted on these subjects than he. For many years he has been the railway editor of the Record, and he was regarded as a high authority on railroad news. For some years, and at the time of his death, Mr. Crutchfield was the Philadelphia correspondent of The American, and his special despatches on railroad matters and other business topics were read with interest in Baltimore's business circles. Mr. Crutchfield possessed those genial qualities which made him many friends. He was a hard worker. By his death the Record loses a valuable editor and The American one of its best correspondents. The deceased was but thirty eight years of age, and leaves a wife and one child.

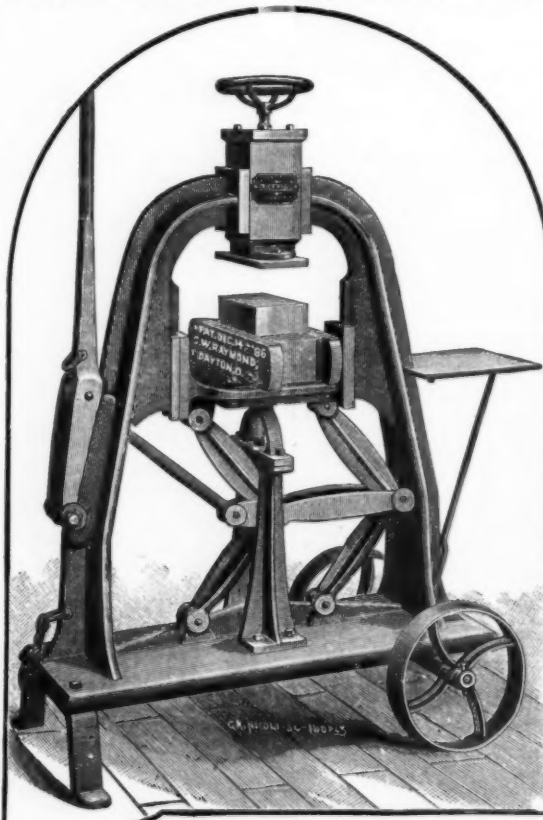
THE January Wide Awake is the New Year's issue, a fine holiday number, delightfully pictorial, giving as it does a dozen of the beautiful pencil pictures of child life by the English pencil-artist Warwick Brookes, together with an autograph letter of Mr. Gladstone's. Mr. Letherbrow's account of him is very interesting. But the most valuable article of the number is "The Foster-Children of George Washington," the first of Mrs. Harriet Taylor Upton's series, "Children of the White House." This has seventeen illustrations from the beautiful Stuart and Pine paintings and from old objects and scenes in and around Mount Vernon. The various presidential families are said to be greatly interested in

this series, knowing how valuable it will remain for all time to come to young American people. Another delightful contribution is an illustrated article by Maud Howe (daughter of Mrs. Julia Ward Howe) entitled "My Friends, the Dogs;" this furnishes the frontispiece; "Miss Maud Howe and her dog Sambo," from the famous painting, by B. C. Porter in the Corcoran Gallery, Washington. Prof. Roberts, of King's College, Windsor, furnishes a good true story, "The Bull and the Leaping Pole." Olive Risley-Seward gives an exciting story of her "Journey to Peking," with Secretary Seward in his trip around the world. Mrs. General Fremont in her "Cruise of a Coverlet,"

writes a pathetic account of Farragut and his flagship the Hartford, and the taking of the famous old warship "out of commission," and makes a powerful appeal to the country and to Congress to save the vessel as a national possession, as the English nation preserve the old warships of Lord Nelson.

Raymond's Perfection Brick Press.

The illustration herewith presented is that of Raymond's Perfection Brick Press. It was brought into extended notice recently at



PERFECTION BRICK PRESS.

the National Brick Makers' Assembly, held at Chicago, by its unique and novel adaptability for making ornamental bricks, such as string and belt courses, panel work, &c., the most elaborate designs being pressed upon one die and delivered therefrom by one motion of its powerful lever, and that without any previous preparation of the brick or striking out mould. Usually this work requires a separate die for each design and a corresponding mould for striking out to work with it, but by the use of the Perfection this great item of expense is saved, and the manufacture of ornamental and moulded brick brought within the range of the man of ordinary means and facilities. The press

was critically examined by the numerous brick manufacturers present, who seemed to approve of its utility and recognize its value to the craft. It is manufactured by C. W. Raymond & Co., Dayton, Ohio.

Gadsden, Ala.—Rapid Completion of Her Industries.

GADSDEN, ALA., JAN. 13, 1888.

Editor Manufacturers' Record:

The 100-ton coke furnace now being built by the Gadsden, Alabama Furnace Co. is rapidly approaching completion. The magnificent new hotel, the Printup House, has been sold to L. W. Scovill, formerly of the Kimball House, of Atlanta, Ga. Mr. Scovill will open this splendid hostelry on or before the first of March next. The splendid iron bridge over the Coosa river will be ready for the trains by the 15th of February. The Rome & Decatur Railroad is to be completed in sixty days. Arrangements have been made in New York to complete the Tennessee & Coosa Railroad to Guntersville, Ala., by the first of October, 1888. New York capitalists have been placed in the directory, and the completion of this line, connecting the waters of the Tennessee and Coosa rivers, will be completed as soon as men and money can accomplish it. This road opens up to Gadsden the finest coal, iron and timber section in the South; gives us the short rail and long water haul to St. Louis and cities of the West. The Gadsden Land & Improvement Co. contemplate a public sale of 1,000 lots in February, at which the stock of the company will be received in payment at 25

Smith's Friction Drill.

A thoroughly practical and most valuable invention, one of much interest to machinists, boiler-makers, steam pipe and gas fitters, and to all parties who have occasion to use the ratchet drill, is shown in the annexed cuts. There are so many places where recourse must be had to the ratchet drill that any real improvement on the old ratchet movement, with its noise, its lost motion at each thrust, and its frailty, will be of real benefit to the mechanical world.

In the friction drill here shown the well-known and absolutely certain friction-clutch principle is employed, and that so successfully and instantaneously that this drill will work successfully and with good speed in the space lost, or, in other words, the lost motion space of the ratchet. To illustrate: It requires over 3 inches of backward thrust



FRICTION DRILL.

at the out end of the 12 inch handle of the ratchet drill to enable the ratchet to catch one tooth. With this friction drill less than 1/2 inch backward thrust will suffice to set the clutch; in fact, the eye will fail to detect any backward movement of the clutch, so very careful and perfect is the mechanical arrangement. It will successfully work, therefore, in places so contracted that a ratchet drill is entirely useless. By reason of its construction and arrangement, it has hardly more than half the parts in number of the ratchet, and it will stand, it is said, strains and hardships that would destroy the intricate mechanism of the old style drills. All the working parts, the body, cam, friction rolls and feeding screw are of the best quality of steel, drop forged and specially tempered. The feed-screw has a regular turned square thread that will resist any pressure required to force a dull drill.

This drill is the invention of Geo. W. Smith, of Boston, aided by his brother, B. F. Smith, the latter having spent a large amount of money and years of time in bringing it up to its present form. In this form it has been in use subject to the severest tests during some four years, and is now put on the market with every guaranty of success. Two styles are made, one for ordinary drilling, as illustrated in the cut, and one for boiler-makers' use, which is shown in the advertisement on page 1062. They are gotten up in excellent style and workmanship. They are manufactured by the F. F. Waters Manufacturing Co., 266 Washington street, Boston Mass., who should be addressed for further particulars.

THE Anniston Hot Blast thinks that the man who doesn't advertise because times are dull is about as wise as the one who won't eat because his stomach is empty. That is hitting the nail on the head pretty closely.

THE MANUFACTURERS' RECORD, published in Baltimore, Md., and devoted largely to notices of Southern industrial enterprises, is one of the best journals of its class with which we are acquainted. It is edited with marked ability, and published in the best style of the typographic art—Greensboro (Ala.) Beacon.

ADVERTISERS wishing to reach the manufacturers of all classes, mining companies, steel, iron and hardware dealers of the entire South, cannot find a better medium than the MANUFACTURERS' RECORD.

Subscribe to the Manufacturers' Record.

ALABAMA'S GREAT MINERAL WEALTH

SURROUNDS THE

★ CITY OF TALLADEGA, ★

Which, according to statistics, is the **MOST HEALTHFUL CITY IN ALABAMA**, and the County Seat of Talladega County.

THE CITY HAS A POPULATION OF 5,000, AND ITS POPULATION IS RAPIDLY INCREASING.

TALLADEGA is on the main line of the E. T. V. & G. Railroad, the A. & A. Railroad, and is the present terminus of the T. & C. Railroad. Work is rapidly progressing on the Birmingham & Savannah Air Line Road, between Birmingham and Savannah, and within twelve months this road will be completed via Talladega from Birmingham to Savannah, which will place Talladega on the direct line from Birmingham to deep water on the Atlantic, making

TALLADEGA ONE OF THE BEST DISTRIBUTING POINTS IN THE STATE.

THE CITY HAS

AN EXCELLENT SYSTEM OF COMMON GRADED SCHOOLS,

With a scholastic population of 500, and **THE MOST COMMODIOUS AND ATTRACTIVE PUBLIC SCHOOL BUILDING IN THE STATE.** The main building is a three-story brick, slate roof structure, well ventilated, heated by steam; has accommodations and seating capacity for 500 pupils. This school is owned and sustained by the city. All branches of English literature, foreign languages, music, the sciences and art, are taught for a nominal tuition. Among other educational institutions are the following:

SYNODICAL FEMALE INSTITUTE, Property valued at \$50,000.

D. D. & B. INSTITUTE, Property valued at \$150,000.

BLIND INSTITUTE, (in course of construction,) property valued at \$150,000.

FOSTER COLLEGE, property valued at \$150,000.

No other city in Alabama has so many educational institutions and so many public buildings.

← TALLADEGA HAS THE MOST COMPLETE SYSTEM OF WATER WORKS IN THE STATE. →

The stand pipe has a capacity of 175,000 gallons, and into this reservoir a supply of fresh, clear, pure water is pumped every day from a large spring located in the heart of the city, which discharges over 2,000,000 gallons per day. The gravity pressure from this system is 90 pounds to the square inch in the business portion of the city. The city has broad streets, well macadamized and shaded with beautiful trees, and is well lighted with a **SUPERIOR QUALITY OF GAS.** Sixty fire plugs and forty gas lamps protect against fire and illuminate the streets.

A LARGE FURNACE PLANT gives employment to thousands of hands, and makes a high grade of chilled car-wheel iron from ores, limestone and coal within ten minutes haul by rail, or an hour's haul by wagon. **FOUR LARGE LUMBER MILLS**, with an aggregate daily capacity of 200,000 feet of lumber, cut from the long-leaved yellow Pine of this country. **FOUR BRICK YARDS** are in active operation. A SASH, DOOR and BLIND FACTORY, a FOUNDRY, MACHINE SHOP, FLOUR MILL, COTTON-SEED OIL MILL, and various other industries are in successful operation, and the TALLADEGA ICE CO. cools the thrifty population with pure ice at 50 cents per hundred. Another large furnace plant will be completed within the next ten months. A Spoke and Handle Factory and many other industries are projected, with a view to early completion.

Taxable property has increased 100 per cent, within the past twelve months. The rate of taxation is limited in the city charter to half of one per cent., and the city offers an exemption from taxation to all manufacturing enterprises for a period of ten years. The county of Talladega supplies more crude material, in the way of minerals and timber, than any other county in the State. Almost within the corporate limits of the city are extensive deposits of the highest grades of limonite ores, yielding 50 to 58 per cent. metallic iron, with only a trace of phosphorus, and limestone abounds in the greatest abundance. Coal is within twenty miles by rail.

THE TALLADEGA LAND & IMPROVEMENT CO. owns 5,000 lots suitable for residences, business and manufacturing, in and adjacent to the city. Lots are donated to manufacturing enterprises, and liberal inducements offered to actual settlers. SPRING LAKE PARK is owned by this company, and it is being made the most attractive resort in the State. The lake covers an area of seven acres, and is a beautiful sheet of clear spring water. Parties seeking a healthy climate, free from malaria and epidemics, and a prosperous city, are invited to visit Talladega. Address for maps, etc.

The Talladega Land & Improvement Co., ÷ Talladega, Ala.

ATHENS, East Tennessee

THE COMING

→ Iron and Manufacturing City of the South. ←

Athens is the county seat of one of the most fertile counties in East Tennessee. The health of the city is unsurpassed, and is **ABSOLUTELY FREE FROM ALL MALARIAL OR EPIDEMIC DISEASES**. The surrounding scenery is very fine. From the main avenue the whole valley of East Tennessee can be seen, from the Cumberland Mountains on the west to the Great Smoky Mountains on the east; some of the tallest peaks east of the Rockies being in full view. FINE MINERAL SPRINGS are adjacent and are popular summer resorts. The society of Athens is excellent. A cordial welcome is extended to all law-abiding people locating in the town. The EDUCATIONAL FACILITIES are good. Beside public and preparatory schools, Athens is the seat of **THE GRANT MEMORIAL UNIVERSITY**, which has an enrollment of over 300, and whose graduates include some of the most distinguished citizens in the country. Among the industries and institutions of the place in active operation are:

THE ATHENS BUILDING & LOAN ASSOCIATION, \$250,000. THE ATHENS WOOLEN MILLS, \$100,000.

THE FIRST NATIONAL BANK, \$50,000.—To be increased at once.

FOUNDRY & MACHINE SHOPS, \$25,000.

FURNITURE WORKS, \$15,000.

FLOURING MILLS, \$20,000, etc.

500 men are now at work on the new railroad from Athens to the

RICHEST IRON FIELDS IN THE SOUTH.

JUST EAST OF THE TOWN.

Only eight miles from Athens are **VEINS OF RED FOSSILIFEROUS ORE 11½ FEET THICK**, and 4 to 12 miles beyond are **THE LARGEST DEPOSITS OF BROWN ORES IN THE SOUTH**. The ores of both varieties, in addition to being inexhaustible, are both superior in quality to any ores of either variety at present mined in the South. An assertion that can be sustained. Coke can now be obtained at the lowest prices, and in addition a new railroad is now projected to the Cumberland Coal Fields, only 22 miles distant. These roads will give Athens **UNSURPASSED SHIPPING FACILITIES**. The road under construction will penetrate large deposits of Tennessee Variegated Marble; also an Unopened Timbered Region, and will develop the

Largest Colored Slate Deposits in the United States.

These quarries are now being opened, and are pronounced by experts Absolutely Inexhaustible, and equal in quality to the finest Vermont Colored Slate.

The ATHENS MINING & MANUFACTURING CO.

Have alone just contracted for the erection of over

\$500,000 IN NEW MANUFACTURING ENTERPRISES

At Athens, including a 100 ton Blast Furnace, cost \$200,000; Cotton Mills, cost \$150,000; Furniture Works, employing 200 men, cost \$100,000; Hotel, cost \$60,000; Water Works, Street Car Lines, &c. These improvements have been commenced which, added to other improvements projected, will add

\$1,000,000 OF NEW MANUFACTURING ENTERPRISES TO ATHENS.

The company desire to open correspondence with parties desiring to locate, and will extend liberal inducements in addition to gifts of sites in order to induce New Manufacturing Enterprises to locate in Athens. City property is doubling in value every few months, and at present low prices is beyond question a very fine investment.

The Athens Mining & Manufacturing Company,

R. L. BRIGHT, President.

R. J. FISHER, Secy. and Genl. Manager.

DECATUR, ALA.

Offers outside investors better inducements to locate than any other

 CITY IN THE SOUTH. 

AS A CITY OF

Mammoth MANUFACTURING Enterprises,

She has few equals and no superiors in the South.

There have been located at Decatur in the last four months the following Industries :

THE DECATUR LAND, IMPROVEMENT & FURNACE COMPANY. Has 50,000 ACRES of Iron, Coal, Mineral and Timber LANDS
The Louisville & Nashville Railway Car Works. Cost of Buildings, \$300,000.

Charcoal Company's plant, costing \$120,000.

A seventy-ton Charcoal Iron Furnace, costing \$190,000.

A one hundred-ton Blast Iron Furnace, costing \$225,000.

The Decatur Iron Bridge Construction Company; cost of plant, \$100,000.

The American Oak Extract Company's plant, costing \$60,000.

Ivens & Sons Steam Boiler and Engine Works, costing \$100,000.

Morse Cotton Compress plant, costing \$60,000.

Decatur Lumber Company, Saw and Planing Mills, costing \$50,000.

Berthard & Co., Sash, Door and Blind Factory, cost \$15,000.

The Decatur Street Railway Company.

The Telephone Company.

Brush Electric Light Company, cost \$10,000.

The Ironton Wheelbarrow Company, cost \$25,000.

Howland & Co's Water Works System, costing \$200,000.

Bleymeyer Artificial Ice Company, cost \$10,000.

Four Mammoth Brickyards.

Jones, Poley & Co's Lumber Yards.

The Hoosier Mills & Building Company.

The Gate City Sash & Door Company.

Arantz Bro's Mills and Lumber Yards.

Grant & Co's Furniture Factory.

Southern Lumber Company.

H. S. Freeman's Mills and Lumber Yards.

The Alabama Farmer's Friend Fence Machine Company.

The Decatur Artificial Stone Company.

Decatur Chain and Architectural Iron Works, capital \$100,000.

Natural Gas Company, capital \$200,000.

First National Bank, capital \$100,000.

The Exchange Bank of Decatur, capital \$100,000.

Merchants' Insurance Company, capital \$100,000.

Decatur Building Association, capital \$300,000.

Decatur Building Company, capital \$1,000,000.

Buchheit's Bottling Works.

Decatur Printing Company.

Two daily papers, three weekly papers.

Two hotels are building—one \$60,000, one \$300,000; the largest in the South.

Grand Opera House, \$100,000.

THERE ARE OTHER

Mammoth Enterprises

Locating here, and contracts are being made with some of the most extensive industries in the United States.

Decatur is the Healthiest city in Alabama, the death rate among whites for 1886 being only 11 in 1,000.

Decatur Land, Improvement & Furnace Company.

E. C. GORDON, President.

H. G. BOND, Vice-Prest. and Gen. Manager.

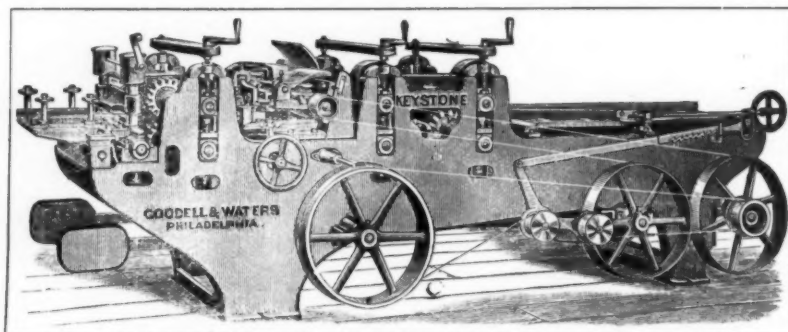
W. E. FOREST, Secretary.

This Company has been pre-eminently successful in promoting the interests of the city of Decatur.

CORRESPONDENCE SOLICITED WITH PARTIES SEEKING LOCATIONS.

"KEYSTONE"

Rapid Feed Flooring Machine.



SEND FOR DESCRIPTIVE CIRCULAR AND PRICES.

GOODELL & WATERS, Manufacturers,

WESTERN WAREHOUSES:

11 and 13 S. Canal Street,
CHICAGO, ILL.

MR. C. L. RICE, MANAGER.

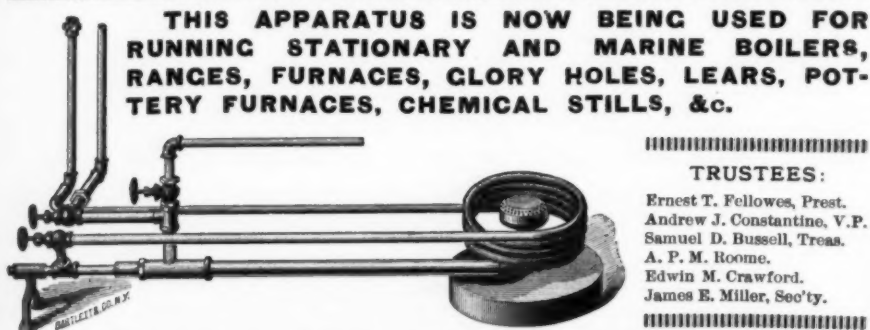
3002 Chestnut Street,

PHILADELPHIA.

ECONOMY IN FUEL!

SUBSTITUTE FOR COAL AND WOOD.

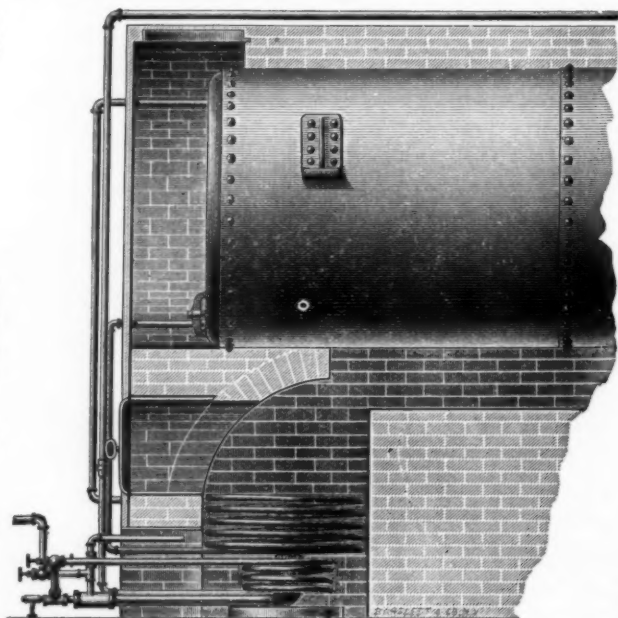
Manufactories, Public and Private Buildings supplied
with Heat and Power at half the cost of coal
or wood, by means of a new apparatus for
★ the perfect combustion of petroleum ★
and other liquid fuels.



THIS APPARATUS IS NOW BEING USED FOR
RUNNING STATIONARY AND MARINE BOILERS,
RANGES, FURNACES, GLORY HOLES, LEARS, POT-
TERY FURNACES, CHEMICAL STILLs, &c.

TRUSTEES:

Ernest T. Fellowes, Prest.
Andrew J. Constantine, V.P.
Samuel D. Bussell, Treas.
A. P. M. Roome.
Edwin M. Crawford.
James E. Miller, Sec'y.



OFFICE OF THE CRYSTAL PALACE GLASS WORKS, BROOKLYN, N. Y.
In the past four years we have experimented with a great many burners for Glory Holes,
and have found the "Seery Burner" to be the most satisfactory. Having been using four of
these burners for twelve months at our works with the best results, we can recommend it as
safe, economical and reliable. Respectfully,
THE E. P. GLEASON MFG. CO.

JAMES J. MURRAY & CO., MERIDIAN FLINT GLASS WORKS,
Manufacturers of Opal and Flint Globes and Shades of all Shapes for Gas, Kerosene and
Electric Light Purposes.

EMPIRE HYDRO-CARBON CO., 18 Exchange Pl., N. Y. City. MERIDIAN, CONN., Nov. 7, 1887.
DEAR SIRS—We have been using your Seery Burner for the last two weeks, and it has given
us much satisfaction. From the present indications we believe it produces a greater heat with
the use of less oil than any burner we have heretofore used. You now have an order from us to
put in two more in our two other glory holes, which we trust you will execute without delay.
Very truly yours,
JAMES J. MURRAY & CO.

No. 230 LEWIS STREET, NEW YORK, October 26, 1887.
THE EMPIRE HYDRO-CARBON COMPANY, No. 18 Exchange Place, N. Y. City.

GENTLEMEN—We have been using one of your Hydro-Carbon Apparatus under one of our
hoisting portable boilers for several months past, and it gives us entire and complete satisfac-
tion. It is so simple in construction and so easily controlled that our engineer handles it with-
out difficulty. At the price we pay for oil, it is more economical than coal, besides taking into
consideration its being entirely free from ashes, soot, dust or smoke. We cheerfully recommend
it. Yours very truly,
CONSTANTINE & CO.

OFFICE OF THE ECLIPSE LUBRICATOR COMPANY,
Greenpoint Avenue and Newtown Creek.

EMPIRE HYDRO-CARBON CO. BROOKLYN, September 14, 1887.
GENTLEMEN—We take pleasure in stating that the oil burner which you placed under our
boiler gives us entire satisfaction, doing all that you claim for it, and we consider it a decided
success. Yours, etc.,
ECLIPSE LUBRICATOR CO.—Chas. A. Miller.

EMPIRE HYDRO-CARBON CO.

Office, 18 EXCHANGE PLACE, - - NEW YORK.
Factory at EAST 23d STREET, - - NEW YORK.
Manufacture under U.S. Letters Patent. Infringers will be proceeded against according to law.

TRADE NOTES.

THE Chalmers-Spence Co., of New York, have issued a descriptive pamphlet of their asbestos covering, packing, &c., for free distribution.

THE Vulcan Iron Works, Oswego, N. Y., manufacturers of steam shovels, report a growing demand for their excavators. They have just completed several new machines for work at the mines at Hazelton, Pa. These steam shovels do very effective work.

THE Van Dorn Iron Works, of Cleveland, Ohio, have one of the largest and finest plants for the manufacture of architectural iron work, fencings, etc., in the country. They take contracts for jail and courthouse work and are fully up to the times in all their departments.

BRICK-MAKERS will find the 1888 catalogue of C. W. Raymond & Co., of Dayton, Ohio, of much interest. They are extensive manufacturers of brick machines and general supplies for brick-makers. The catalogue illustrates and describes many things essential to good brick-yards.

POST & Co., manufacturers of hand, foot and power machinery, of 154 Lake street, Chicago, state that among the many inquiries they have received, is one from Dublin, Ireland. They are making shipments to nearly all points of the compass, and the outlook is good for 1888.

THE Covert Manufacturing Co., of West Troy, N. Y., have published their 1888 catalogue and price-list, which will be found of much interest by all hardware and harness dealers. The variety of goods made by this company, such as bits, snaps, horse-ties, chains, hitching posts, &c., is something remarkable.

THE new patent steel car springs manufactured by the Cliff & Righter Co., Limited, of Oswego, N. Y., is a great improvement on the old style of car springs, and is destined to be adapted by nearly all the leading car shops at an early date. An illustrated descriptive circular and miniature model will be sent to interested parties who apply.

E. W. CURHART, manager of the Holmes Burglar Alarm Telegraph Co., at Providence, R. I., has invented a simple device for suspending electric cables and wires. The arrangement is entirely automatic, and can be put up or detached in a moment. The support is broad and does not cut through the coating, and combines the additional qualities of strength, durability and cheapness.

THE Crosby Steam Valve Co., of Boston, have just completed a new factory, 125 by 45 feet, with an L, 70 by 46 feet, and three stories high. It is built of brick, and has all the modern appliances for extinguishing fire—a steam pump in the basement and sprinklers all through the building. It is constructed throughout with special reference to the health, convenience and comfort of the workmen, which is coming to be understood as the true method of economy in manufactories.

THE Rochester Machine Tool Works, Rochester, N. Y., report that the trade on the Acme Automatic Safety Engine grows most rapidly in the sections where it has been longest in use. They also report an increased demand for these engines separate from the boilers for use in driving electric light plants in river boats, etc. The sizes mostly used are 1, 2 and 4 horse-power. This enterprising firm are about to bring out a new boiler for use on government waters in launches, &c. This boiler will be a rapid steamer.

THE Albany Steam Trap Co. have made a great success of their new duplex filter. It was brought out one year ago, and offered on its merit without any previous prestige. During this time they have sold 100, ranging in capacity from 5 to 250 gallons per minute, and, we are informed, they give entire satisfaction. The water on passing through comes out bright and sparkling and entirely free from all mechanical impurities.

THE Kingsford Iron Works, at Oswego, N. Y., have brought out a new automatic high-speed engine, which differs very materially from other engines of this class. It has few parts, is very simple in its construction, and is much heavier and stronger than any pattern heretofore adopted, being built for durability and hard, constant service, and yet are cheaper than most automatic engines. They are spoken highly of by those who have seen them in operation.

TO THE TRADE.

BALTIMORE, MD., Jan. 3, 1888.

Dear Sirs—We would notify you that the firm of Thomas K. Carey & Co., composed of Thomas K. Carey and A. Morris Carey, general partners, and James Carey, special partner, was dissolved on December 31st, 1887.

The firm of Thomas K. Carey & Bros., composed of Thomas K. Carey, James Carey, Jr., and A. Morris Carey, general partners, and James Carey, special partner, will succeed the above firm and continue the business of mill and machinists' supplies, machinery, and rubber goods for mechanical purposes, at the same place of business.

Respectfully yours,

THOMAS K. CAREY & BROS.

THE Hercules Iron Works, of Chicago, are energetically pushing their trade into all sections of the South. In addition to their Northern refrigerating trade, contracts were filled last season with the Lone Star Brewing Co. and Alamo Mills Co., both of San Antonio, Texas, and they are now building machines for Corsicana, Texas; Asheville, N. C.; Havre de Grace, Md.; San Antonio, Texas, etc. The entire machine is constructed complete in their own works, which are said to be the best equipped in the country. In proof of their claim to have the strongest, most simple and most economical ice making machine yet devised, they show flattering testimonials from every customer who has purchased their machines since their introduction, three years ago. Illustrated circular sent upon request.

MR. W. B. BARRY, of the W. B. Barry Saw & Supply Co., of Indianapolis, has issued the following circular: "Having re-organized my business, I take this method of informing you that I begin the new year better prepared than ever before to turn out first-class work and to execute your orders more promptly. To those who have used or sold my saws I need to say but little as to the quality of my work, but I wish to assure all such that I will maintain the high reputation my goods have already attained, giving all departments my careful personal supervision. To those who have not used my saws I wish to say that all my work is fully warranted in every particular, and I respectfully solicit a trial order, that you may be convinced as to the merits of my claim. My line of supplies will have the same careful attention as heretofore, and will consist of the best brands of belting, files, emery wheels, lace leather, etc., all of which will be furnished at the lowest market prices."

AN ENERGETIC FIRM OF MANUFACTURERS.—The enterprise of the Shultz Belting Co., a prominent local industry, was most excellently displayed a few days ago and in a way that could not be surpassed by any similar institution in the country. It seldom occurs that such a concern is offered an opportunity

to show what can be done on short notice, but the test came Saturday afternoon at three o'clock, when the Brush electric light plant was burned out, completely destroying all the belting of that extensive establishment. The consequence was that darkness hung over the stores of the company's patrons, and they began calling for electricity. There was no way of producing a current without belting, and as the sizes wanted were of such unusual dimensions none could be found in stock. Therefore the Shultz Belting Co. began that afternoon to manufacture belting from the leather which they had on hand. By working their forces night and day they succeeded in having the Brush plant in full operation again at three o'clock Monday afternoon. In the meantime, five double 12 inch, one double 20-inch, one double 24-inch, 210 feet of 12-inch, 72 feet of 20-inch and 72 feet of 24-inch leather belting was cut, made and fitted accurately to the electric pulleys. This is the quickest job ever accomplished in this line of manufacture, and is fully in keeping with the enterprise of the firm, which is second to none in the country. Its trade is represented by agents in all the principal cities of the United States, and the factories' products are shipped to France, Holland, Mexico, and even to Cairo, Egypt.—St. Louis Globe-Democrat.

Philadelphia Trade Notes.

THE Thorn Shingle & Ornament Co., at the corner of Twelfth and Callowhill streets, was incorporated December 19th. Mr. J. S. Thorn is president, and Mr. D. R. Harris, treasurer. The new company starts out with flattering prospects. Mr. Thorn recently purchased the property of the Philadelphia Smelting Co., at the corner of Twelfth and Willow streets. The lot has an area of 54x190 feet, and cost \$30,000. A handsome six-story factory to cover the entire lot is contemplated, to which the company will remove its quarters when the structure is completed.

THE Energy Manufacturing Co. last week received an inquiry from Sweden for their rope hoist. Recent orders are from Lobdell Car Wheel Co., Wilmington, Del.; G. W. Helms, Winchester, Ind.; W. P. Brewer, Birmingham, Ala.; Speers Wadding Co., Memphis, Tenn.; Benjamin A. Stevens, Toledo, O.; James A. Bedell, Suffolk, Va.; Williams, Tanner & Co., Fort Plain, N. Y.; Benedict & Burnham Manufacturing Co., Waterbury, Conn.; W. G. Ricker, Rochester, N. Y.; Canadian Pacific Railway Co., Montreal, Canada, and many others. The firm has prepared neat and complete descriptions of their wares, which are sent out on application to the office, 1115 South Fifteenth street.

BUTOLETTE & LUKENS now have twenty-three machines at work making steel wire nails.

THE Vulcan Iron Works are about to remove their office headquarters from 34 South Second street to the works at Chester. Continual improvements are being made, and it has been found desirable to concentrate the force. The capacity of the works has been enlarged.

Speed on Southern Railroads.

The Queen & Crescent Route, running trains from Cincinnati to New Orleans and Shreveport, La., and passing through Chattanooga, Birmingham, Tuscaloosa, Meridian, Jackson and Vicksburg, has, with its "Queen & Crescent Limited Express," reduced the time between Cincinnati and New Orleans (827 miles) to twenty-five and a half hours. This train leaves Cincinnati at 7:55 A. M., and arrives at New Orleans at 9:30 next morning.

SIX CENTS ISN'T MUCH! But it will buy the neatest, best, most accurate and satisfactory guide-book of New York City ever issued—128 pages and map. 50,000 of these already issued. Send six cents in stamps to Advertising Department, Grand Union Hotel, New York.

Important.

When visiting New York city, save baggage express and carriage hire, and stop at the Grand Union Hotel, opposite Grand Central Depot.

600 handsomely furnished rooms at \$1 and upwards per day. European plan. Elevators and all modern conveniences.

Restaurants supplied with the best. Horse cars, stages and elevated railroads to all depots. You can live better for less money at the Grand Union Hotel than any other first-class hotel in the city.

THE American House, Boston, needs no recommendation to the generality of travelers, but it may not be amiss to inform those who are contemplating their first visit to the "Hub" that no hotel in that city is better than the "American." It is conveniently located to all lines of travel as well as the business portion of the city, and no effort is spared to maintain the high rank the house has held so long.

THE Palace Hotel, Cincinnati, Ohio, is said to enjoy the reputation of being the best \$2 hotel in America. 250 rooms; 140 front rooms. All conveniences and excellent cuisine.

THE St. Charles Hotel, at Lowell, Mass., kept by Geo. R. Cushing, is the place for comfortable entertainment. Travelers will do well to keep it in mind.

WESTPHAL'S IMPROVED REVOLVING SCREW, BOLT AND SHOT CASES.
ADJUSTABLE FIRE BACKS AND LININGS FOR COOK STOVES.
IRON STORM THRESHOLDS.
SEND FOR ILLUSTRATED CIRCULARS.
SCHENCK'S ADJUSTABLE FIRE BACK CO.
94 MARKET STREET, CHICAGO.

THE KRIEBEL BOAT ENGINES.
WITH UPRIGHT OR HORIZONTAL BOILERS.
2 TO 20 HORSE POWER.
RICE & WHITACRE MFG CO.
CHICAGO, ILL.

STIFF PIANOS
THE BEST.

Office and Warerooms, - 9 N. Liberty Street, BALTIMORE, MD.

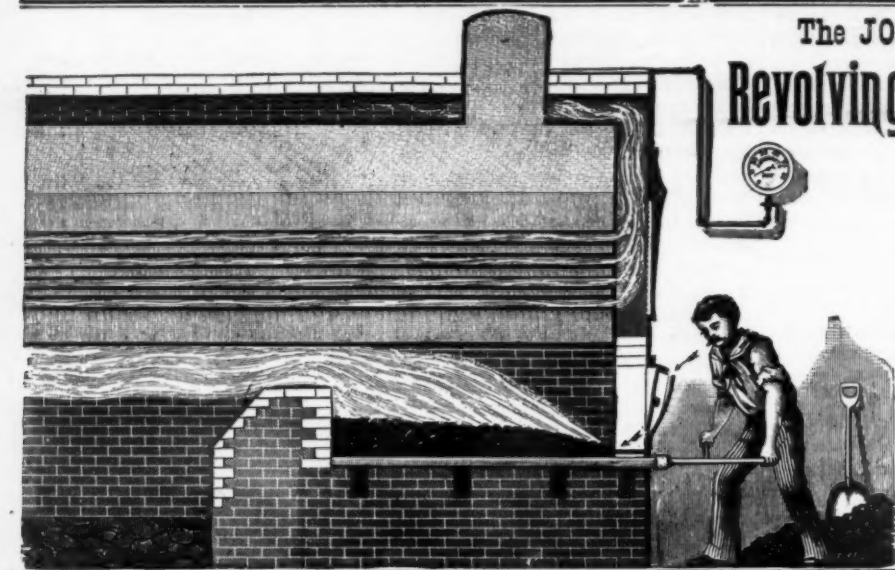
—For the Latest Improved—
FAST FEEDING

Planing Mill Machinery,

ADDRESS THE

Preble Machine Works Co.,
CHICAGO, ILL.

PERFORATED METAL
FOR
COTTON SEED OIL MILLS
RICE MILLS
MINING SCREENS &c
THE ROBERT AITCHISON PERFORATED METAL CO.
76 Van Buren St. Chicago, Ill.



The JOHN ASHCROFT Patent TRIANGULAR Revolving Steel Grate Bars & Furnace Doors

Eight per cent. in coal saved by the use of these Doors and Steel Bars guaranteed.

These Steel Bars last four times longer than any cast-iron bar ever made.

Sectional View of Steam Boiler, fitted with John Ashcroft Patent Furnace Door and Triangular Revolving Steel Grate Bars.

Fireman cleaning fire by shaking and revolving the bars, which thoroughly frees the furnace from ashes, and prevents the formation of clinkers, without the use of fire tools or opening the furnace door.

RESULT.—Increase of steam and a saving of coal, and no injury to the boiler by cold air impinging on the boiler shell.

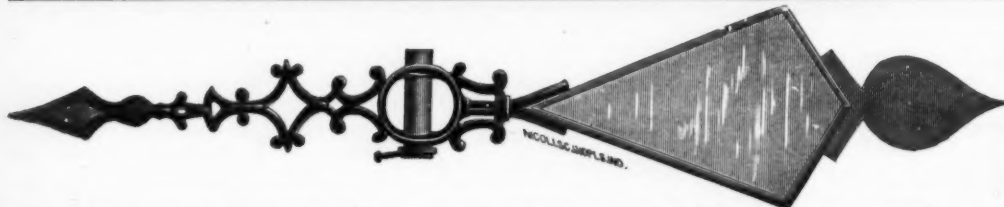
By this operation a saving of 8 per cent. is secured.

FOR INFORMATION AND PRICES, ADDRESS

The John Ashcroft Patent Grate,
Bar and Furnace Door Man'g Co.
No. 73 Cold Street, New York.

P. O. BOX 100.

— ESTABLISHED 1850. —



To the Stove and Hardware Trade:

THE LIGHTNING ROD TRADE has undergone a change in the past few years. Formerly men with wagons traveled over the country, but now these men have almost disappeared. The business of erecting rods on houses has passed into the hands of tinner, hardwaremen and builders, and we simply manufacture them at wholesale for this class of dealers.

The people in each locality prefer patronizing a home firm, and you can just as well sell them their Lightning Conductors at the same time you are doing the tin or roofing work. We furnish printed directions, so that any one can put them up without difficulty. We also manufacture all kind of

WEATHER VANES, CLASS BALLS, &c.

These Conductors have received the Highest Indorsements ever issued on this class of goods, and are therefore standard. Write for prices and inclose 10 cents in stamps for samples.

Munson Lightning Conductor Co.
Indianapolis, Ind.



"OSGOOD"
U. S. STANDARD
SCALES.

3 TON, \$35.00.

Other Sizes Proportionally Low.

Fully Warranted. × Sent on Trial. × Freight Paid.

Illustrated price-lists free. Agents well paid.

OSGOOD & THOMPSON,
BINGHAMTON, N. Y.

* **COLT'S NEW LIGHTNING** *
22 Calibre Rim Fire Magazine Rifle.



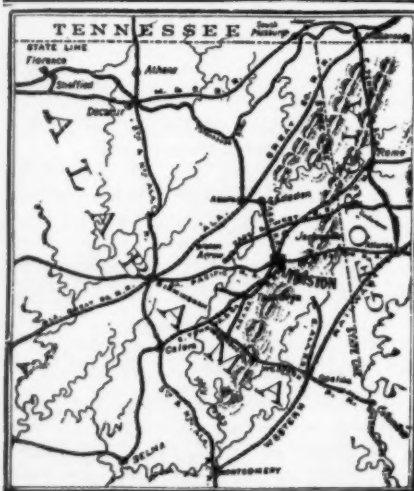
THE MOST PERFECT LITTLE GUN OF THE AGE

For Small Game, Gallery, Target Practice and Snap Shooting, it is unrivaled. It is light, durable and safe. Weight 5½ pounds. The ammunition is cheap—100 shots for 50 cents. For circulars giving full description and price, also for "IDEAL RELOADING TOOLS," address

IDEAL MANUFACTURING CO.

P. O. BOX 1064, C.

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REFERENCES:
First National Bank, Anniston, Ala.
Col. John M. McKleroy, Pres. Anniston City Land Co.

Special attention given to developing Southern Industries, procuring money for promoting Agricultural, Mechanical and Transportation interests, and imparting information to capitalists, as well as all seeking investments in Southern lands.

Northern manufacturers and money lenders will find it to their advantage to confer with us, as well as all persons requiring information as to plants for Cotton Mills, Sugar Mills, Saw and Planing Mills, Foundries, Car Shops, Creameries, Canneries, Tanneries, Brickmaking, etc., etc.

D. L. MITCHEL.

M. B. HILLYARD.

D. L. MITCHEL & CO.
Real Estate,
Loan and Information Bureau,
59 Carondelet Street, New Orleans, La., U. S. A.

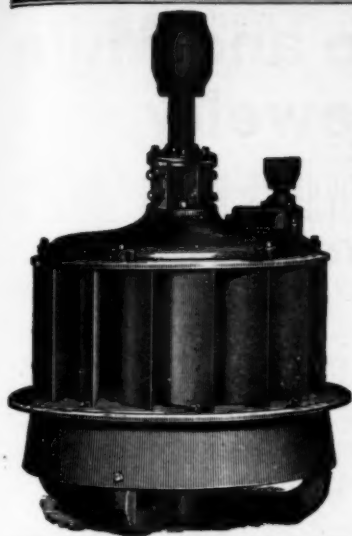
Capital Stock
\$100,000

CORRESPONDENCE
SOLICITED.

ANNISTON, ALA.

REFERENCES.

Right Rev. Hugh Miller Thompson, D. D.; Bishop J. C. Keener, D. D.; Rev. B. M. Palmer, D. D.; Rev. I. L. Leucht; Hon. R. L. Gibson, Senator U. S.; Hon. E. J. Gay, Representative U. S.; Hon. Louis Bush, of Bush & Levert; Col. Wm. Preston Johnston, President of Tulane University; H. Dudley Coleman, Esq., President of Chamber of Commerce; Isidore Newman, Esq., President of Stock Exchange; R. M. Walsley, Esq., President of Cotton Exchange; Joseph C. Morris, Esq., President of Canal Bank; Albert Baldwin, Esq., President of N.O. National Bank; Geo. Q. Whitney, Esq., of Whitney National Bank; Generals E. C. Walthall and J. T. George, U. S. Senators for Miss; Hon. H. L. Muldrow, Asst. Sec'y Interior; Gen. S. D. Lee, Mississippi.



The VICTOR TURBINE

Possesses more than Double the Capacity of other Water Wheels of same diameter, and has produced the Best Results on Record, as shown in the Following Tests at Holyoke Testing Flume:

Size of Wheel.	Head in Ft.	Horse Power.	Per Ct. Useful Effect
18-inch.	18.08	25.17	.9000
17 1/2-inch.	17.96	24.86	.9000
30-inch.	18.51	48.00	.9300
36-inch.	17.90	66.60	.9000
30-inch.	11.65	22.54	.9070

WITH PROPORTIONATELY HIGH EFFICIENCY AT PART-GATE.

Such results, together with its nicely-working gate, and simple, strong and durable construction, should favorably recommend it to the attention of ALL discriminating purchasers. These wheels are of very Superior Workmanship and Finish, and of the Best Material. We also continue to manufacture and sell at very low prices the

ECLIPSE DOUBLE TURBINE.

So long and favorably known. State your requirements, and send for Catalogue to the

STILWELL & BIERCE MFG. COMPANY
DAYTON, OHIO, U. S. A.

STEEL RAILS

Logging, Mining and Plantation

RAIL AND TRAM ROADS.

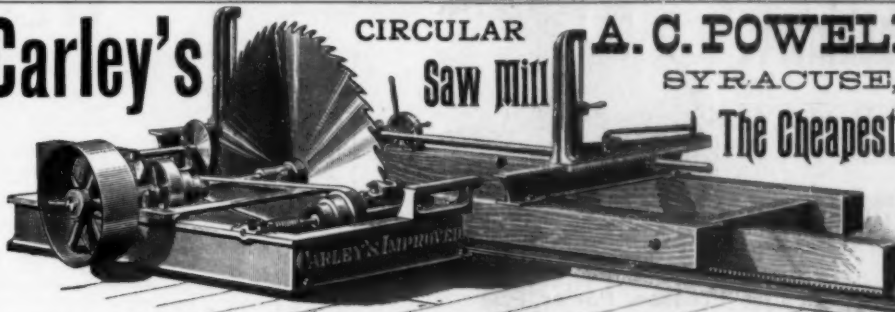
Light Sections Rails and Spikes in stock.
Locomotives, Logging Cars, etc.

NEW AND SECOND HAND.

HUMPHREYS & SAYCE,

OFFICE NO. 1 BROADWAY, N. Y.

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CIRCULAR

Saw Mill

A. C. POWELL & SON,
SYRACUSE, N. Y.

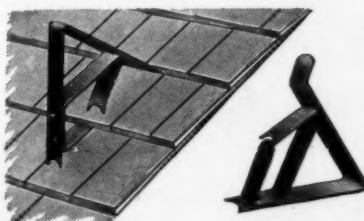
The Cheapest and Best Mill

FOR THE MONEY IN THE MARKET.

Prices, \$250 to \$600.

Write for terms and Description.

CIRCULAR SAW MILL.



A NEW

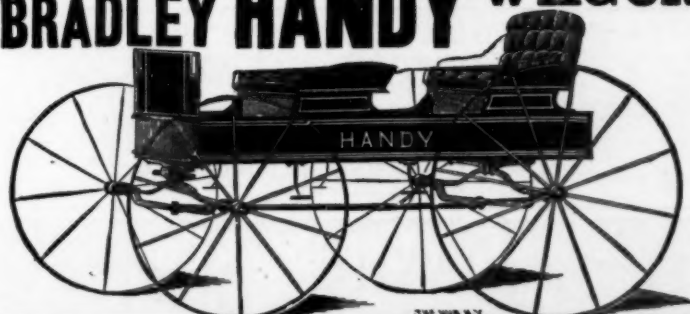
Steel Roofing Bracket

FOR SHINGLE ROOFS.

This can be fastened to any roof without injuring it and without loss of time. It is self-adjusting, has double support, and impossible to break or slip. It will last a life-time and is just the thing for carpenters and builders. Send for circulars to

R. B. THOMAS, 90 Chambers St.,
New York.

BRADLEY HANDY WAGON



The Best on Wheels. Light, strong, convenient, and low priced. Handy to get into and out of. Handy for single horse or pair. Handy for one person or more. Handy to load or unload. Send for free circular "How to purchase direct from Manufacturer."

BRADLEY & CO. SYRACUSE, NEW YORK, or
63 MURRAY ST., NEW YORK.
32 S. MARKET ST., BOSTON.



H. W. JOHNS' ASBESTOS

PLASTIC STOVE-LINING.

One of the most desirable articles for the household ever produced. Easily applied by any one at less than half the cost of brick linings, while it is far more durable.

Only one half the thickness of ordinary fire-brick is required, leaving more space for fuel. Suitable for all kinds of Stoves, Ranges and Furnaces.

Ready for use in 5 and 10 pound cans, also in Kegs and Barrels.

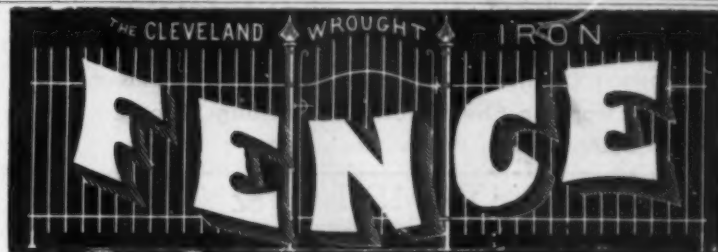
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For Furnaces, Furnace Pipes, etc.

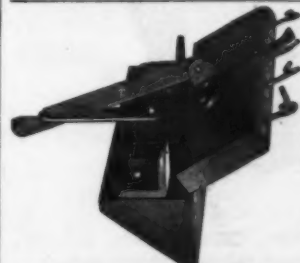
Fire-Proof, Non-Conducting—
33 per cent. of Fuel saved.

Descriptive Price List free by mail.

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THE CLEVELAND WROUGHT IRON
FENCE
FENCING AND RAILINGS, STABLE FITTINGS, LAWN SEATS, VASES, JAIL AND STRUCTURAL IRON WORK.
STATION HOUSE CAGES, CRISTINGS AND TERNINALS, Van Dorn Iron Works, Cleveland, OHIO.
Correspondence solicited.



WALMSLEY'S DEVICE

For Raising and Supporting the Guide Board or Ring Frames and Twisters. In Fall River alone it is used on over 400,000 spindles, or 97 per cent. of all the ring frame spindles in the city. Outside of Fall River its use is scattered from Maine to Delaware, over 400,000 more. Anyone can put them on, being very simple, and its cost nominal.

For prices and information please address

R. WALMSLEY, FALL RIVER, MASS.

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HIGHEST PREMIUM AWARDED WHEREVER EXHIBED

TO THE HOWELL PATENT RAIN WATER CUT-OFF.

HOWELL'S PATENT

Rain Water Cut-Off.

For turning the water into or off the Cistern by merely moving the lever from one side to the other. It is made of tin, and is light, cheap and durable. Write for circulars and prices to the manufacturer. Mention this paper.

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SAFES

We manufacture a line of Fire Proof Safes that combine all the modern improvements and meet with ready sale among business men and dealers of all kind.

Any business house can handle our Safes in connection with any other line of goods without additional expense or interference with any other business.

Weight. Inside Measure. Outside Measure. Retail Price.
No. 2, 250 lbs. 12x8x5 1/2 in. 22x14x13 in. \$50
No. 3, 500 lbs. 15x10x10 in. 25x18x15 in. 85
No. 4, 700 lbs. 18x14x12 in. 28x22x17 1/2 in. 115

Liberal Discounts to Trade.
ALPINE SAFE CO., Cincinnati, O.

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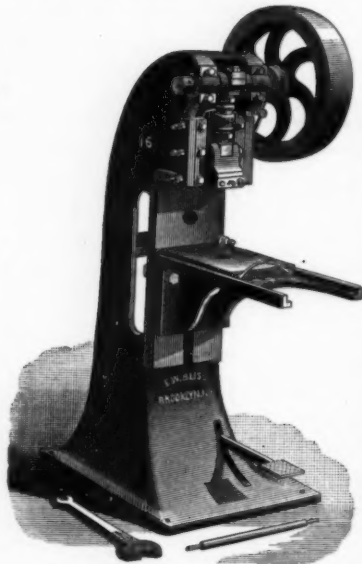
OFFICE: 17 Adams Street.

BROOKLYN, N. Y.**Presses,
DIES**

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Special Machinery,

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Sheet Metal Workers.

Cam Toggle and Drawing Presses, Power Presses, Foot Presses, Automatic Drop Presses for Forging and Stamping, Double Seaming Machines for round, square and oval work, Circular Shears, hand and power; Squaring Shears, foot and power; Canning Machinery, Dies of every description, Tools for working Sheet Metals, Petroleum Can Machinery, Special Machinery. Send for Circulars.

NIAGARA STAMPING & TOOL CO.

— MANUFACTURERS OF —

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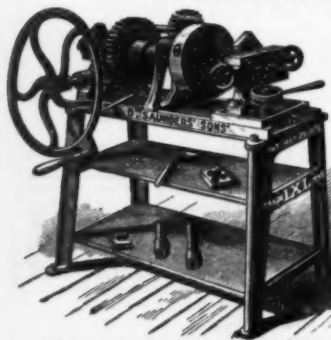
Canners' Outfits.



Squaring & Circle Shears, Presses, &c.

Superior, Cor. of Randall St., Buffalo, N. Y.
Write for our Catalogue and Price-List. Please mention this paper when writing.**D. SAUNDERS' SONS,**

MANUFACTURERS OF THE ORIGINAL

TRADE **I.X.L.** MARK.

Pipe Cutting and Threading Machine.

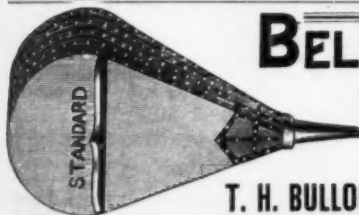
BEWARE OF IMITATIONS. None genuine without our Trade Mark and name. Also

Patent Wheel Pipe Cutter

STEAM AND GAS FITTERS' HAND TOOLS.

Pipe Cutting and Threading Machine

For Pipe Mill Use a Specialty. Send for Catalogue B.

YONKERS N. Y.

Write for Prices.

BELLOWS, FORGES,

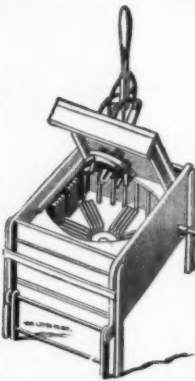
Tools for Blacksmiths, Wagon

AND BOILER SHOPS.

T. H. BULLOCK BELLOWS & FORGE CO.**CLEVELAND, OHIO.****Horse and Mule Jewelry,**Consisting of **COVERT'S PATENT SNAPS,**

— Chain and Web Goods. —

These goods have become standard with the trade, and are sold by all the leading Jobbers in General and Saddlery Hardware in the United States at manufacturers' prices.

Covert Manufacturing Co. West Troy, N.Y.**"THE OLD AND ONLY RELIABLE"**

LATEST IMPROVED FORT WAYNE

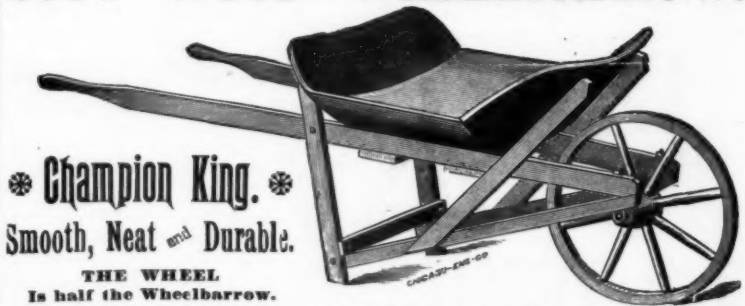
WESTERN WASHER.

SOLD ENTIRELY ON ITS MERITS.

We have furnished these machines to an appreciating public for the past twelve years, during which time the demand for them has increased steadily and rapidly.

Each Machine is Warranted to give Perfect Satisfaction

We want this machine represented in every city and town, and will give liberal discounts to dealers, and will guarantee the sale and satisfaction of them. Price, No. 1 Family Size, \$8; No. 2, Large Family, \$9; No. 3, Hotel Size, \$10. Write for Catalogue and Terms to the

HORTON MFG. CO., Fort Wayne, Ind., U. S. A.**SOFT WOOD WHEELBARROW.*** **Champion King.** *

Smooth, Neat and Durable.

THE WHEEL
Is half the Wheelbarrow.

Our Wood and Iron Center Wheels are the best that were ever used in a Wheelbarrow. They are made as follows: 18 inches in diameter; Lumber, bone dry; Tire put on hot; Painted. We pride ourselves in the fact that while our prices are low, very low, the standard of quality is high, very high. Write for Catalogue and Prices.

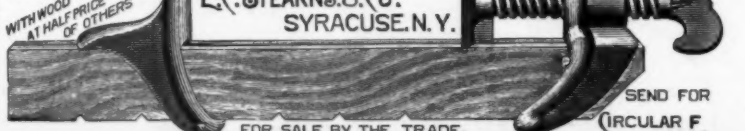
THE BRYAN MFG. CO., Bryan, Ohio.**STEARNS' NEW DOOR CLAMP.**

3 AND 4 FT. LENGTHS.

FURNISHED COMPLETE

E. C. STEARNS & CO.

SYRACUSE, N. Y.



FOR SALE BY THE TRADE.

SEND FOR
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FOR

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259, 261 & 263

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ANVILS.	
Eagle and Vulcan.....	10 c. dia 200
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Conn. Valley Mfg. Co.....	extra, 60x10 5
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Ives' "Jennings" Bits.....	55x10 5
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Expansive Bits, Ives.....	55x10 5
Expansive Bits, Blake's.....	55x10 5
Hollow Augers, Ives.....	55x10 5
Hollow Augers, Douglas.....	55x10 5
Hol. Aug., Bonney's Adjust.....	55x10 5
Hol. Aug., Stearns' Adjust.....	55x10 5
Hol. Aug., Ives' Expansive, each 1/2, 3/4, 1.....	55x10 5
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Gimlet Bits, Shephardson's.....	55x10 5
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AWLS, BRAD SETS, &c.	
Awls, Sewing, Common.....	55x10 5
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Awls, Shouldered Brad.....	55x10 5
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Brad Sets, Aiken's.....	55x10 5
Brad Sets, No. 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40, 41, 42, 43, 44, 45, 46, 47, 48, 49, 50, 51, 52, 53, 54, 55, 56, 57, 58, 59, 60, 61, 62, 63, 64, 65, 66, 67, 68, 69, 70, 71, 72, 73, 74, 75, 76, 77, 78, 79, 80, 81, 82, 83, 84, 85, 86, 87, 88, 89, 90, 91, 92, 93, 94, 95, 96, 97, 98, 99, 100.....	55x10 5
Brad Sets, Stanley's Exc. No. 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40, 41, 42, 43, 44, 45, 46, 47, 48, 49, 50, 51, 52, 53, 54, 55, 56, 57, 58, 59, 60, 61, 62, 63, 64, 65, 66, 67, 68, 69, 70, 71, 72, 73, 74, 75, 76, 77, 78, 79, 80, 81, 82, 83, 84, 85, 86, 87, 88, 89, 90, 91, 92, 93, 94, 95, 96, 97, 98, 99, 100.....	55x10 5
Brad Sets, Stanley's Exc. No. 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40, 41, 42, 43, 44, 45, 46, 47, 48, 49, 50, 51, 52, 53, 54, 55, 56, 57, 58, 59, 60, 61, 62, 63, 64, 65, 66, 67, 68, 69, 70, 71, 72, 73, 74, 75, 76, 77, 78, 79, 80, 81, 82, 83, 84, 85, 86, 87, 88, 89, 90, 91, 92, 93, 94, 95, 96, 97, 98, 99, 100.....	55x10 5

AXES.	
Collins & Co.....	55x10 5
Lippincott or Mann's.....	55x10 5
Single Bit, 1/4 to 3/4 and under.....	55x10 5
Single Bit, 3/4 to 1 and over.....	55x10 5
Double Bit, beveled.....	55x10 5
Double Bit, 1/4 to 3/4 and under.....	55x10 5
Double Bit, 3/4 to 1 and over.....	55x10 5
Double Bit, beveled.....	55x10 5
Second quality Axes.....	75 cts less than above

AXLES.	
Sheldon & Co., iron.....	55x10 5
Sheldon & Co., steel.....	55x10 5
AXLE GRASS—Fraser's.....	55x10 5

BALANCES.	
Spring Balances.....	55x10 5

BELLS.	
Hand, Light Brass.....	55x10 5
Hand, White Metal.....	55x10 5
Hand, Silver Chime.....	55x10 5
Hand, Globe (Cone's Patent).....	55x10 5
Gong, Aiken's.....	55x10 5
Gong, Yankee.....	55x10 5
Gong, Bartons.....	55x10 5
Leon Reading.....	55x10 5
Pull, Brooks.....	55x10 5
Crank, Taylor's.....	55x10 5
Lever, Sargent's.....	55x10 5
Bloomfield.....	55x10 5
Lever, R. & E. M. Co's.....	55x10 5
Call.....	55x10 5
Cow, Common Wrought.....	55x10 5
Cow, Western, Sargent's List.....	55x10 5
Cow, Kentucky, Sargent's List.....	55x10 5
Cow, Moore's or Dodge's, Genuine Ky., new list.....	55x10 5
Nos. 0 1 1/4 2 3 4 5 6 Hog.....	55x10 5
5 10 15 20 25 30 35 40 45 50 55 60 65 70 75 80 85 90 95 100.....	55x10 5
Cow, Texas "Star".....	55x10 5

BELLERS.	
Blacksmith's Common.....	55x10 5
Molder's.....	55x10 5
Hand Bellows.....	55x10 5

BLIND FASTENERS.	
Francis.....	55x10 5
Mackrell's.....	55x10 5
Van Sand's Screw Pattern.....	55x10 5
Van Sand's Old Pattern.....	55x10 5
Merriman's.....	55x10 5
Zimmerman's, 10 1/2 in.....	55x10 5
Zimmerman's, 9 in.....	55x10 5

BLIND STAPLES.	
Barbed, 1/4 in. and larger.....	55x10 5
Barbed, 3/4 in.....	55x10 5

BLOCKS.	
Penfield Blocks.....	55x10 5
Bagnall & Loud.....	55x10 5

BOLTS.	
Cast Iron Barrel Shutter, &c.....	55x10 5
Cast Iron Chain (Sargent's list).....	55x10 5
Wrought Barrels.....	55x10 5
Wrought Square.....	55x10 5
Wrt. Shutter, all iron, Stanley's list.....	55x10 5
Wrt. Shutter, Brass Knob, Stanley's list.....	55x10 5
Wrought Shutter, Sargent's list.....	55x10 5
Wrought Sunk Flush, Sargent's list.....	55x10 5
Wrought Sunk Flush, Stanley's.....	55x10 5
Wrought B. K. Flush, Stanley's.....	55x10 5
Carriage and Tire, Common, new list.....	55x10 5
Carriage and Tire, Philadelphia Pattern.....	55x10 5
Carriage Bolts, Clarke's.....	55x10 5
Norway.....	55x10 5
R. B. & W. Carriage (old list).....	55x10 5
Tire, American Screw Co's., Philadelphia.....	55x10 5
Tire, "Bay State".....	55x10 5
Eagle Philadelphia Tire Bolt.....	55x10 5
Stove.....	55x10 5
Flow.....	55x10 5
Machine.....	55x10 5
Solt Keds and Lag Screws.....	55x10 5

BOLTS.	
Q. S. Backus.....	55x10 5
Barber's.....	55x10 5
Spofford's Patent.....	55x10 5
Ives' Patent Bolts.....	55x10 5
Common Bolt (American).....	55x10 5
Amidon's.....	55x10 5

BORAX.	
Sweet & Clark upright, 2 1/2 angular.....	55x10 5
Lawrence.....	55x10 5
Whitford.....	55x10 5

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1874. CLEVELAND TWIST DRILL CO. 1888.



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ORNAMENTS, STATUARY,
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BRASS, COPPER & ZINC
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Window Caps, Finials, Etc.
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Phillips, with Augers..... 7.50 9.50.....1000

Shelf, plain..... 55x10 5

Shelf, hazy..... 55x10 5

New list..... 55x10 5

Union Nut Co..... 55x10 5

Sargent's..... 55x10 5

Humason, Beckley & Co's..... 55x10 5

NOTES.

Wrought Brass..... 55x10 5

Cast Brass, Fast Joint..... 55x10 5

Cast Brass, Loose Joint..... 55x10 5

Fast Joint, Narrow..... 55x10 5

Loose Joint..... 55x10 5

Loose Joint, Japanese..... 55x10 5

Loose Joint, jap. with Acorns..... 55x10 5

Parliament Butts..... 55x10 5

Mayer's Hinges..... 55x10 5

Loose Pin, no Acorn..... 55x10 5

Loose Pin, Acorn..... 55x10 5

Loose Pin, Acorn, Japanese..... 55x10 5

Loose Pin, Acorn, 1 1/2, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40, 41, 42, 43, 44, 45, 46, 47, 48, 49, 50, 51, 52, 53, 54, 55, 56, 57, 58, 59, 60, 61, 62, 63, 64, 65, 66, 67, 68, 69, 70, 71, 72, 73, 74, 75, 76, 77, 78, 79, 80, 81, 82, 83, 84, 85, 86, 87, 88, 89, 90, 91, 92, 93, 94, 95, 96, 97, 98, 99, 100.....

Tips..... 55x10 5

Wrought Iron..... 55x10 5

Fast Joint, Narrow..... 55x10 5

Fast Joint, Lt. Narrow..... 55x10 5

Fast Joint, Broad..... 55x10 5

Loose Joint, Broad..... 55x10 5

Table Butts, Back Flaps, &c..... 55x10 5

Inside Blind, Regular..... 55x10 5

Inside Blind, Light..... 55x10 5

Loose Pin, Wrt..... 55x10 5

Loose Pin, Light..... 55x10 5

Spring Hinges..... 55x10 5

Gear's Spring and Blank Butts..... 55x10 5

Hart Manufacturing Co..... 55x10 5

American Spring Hinge Co's..... 55x10 5

Gem Spring Hinges..... 55x10 5

NOW PINS.

Humason, Beckley & Co's..... 55x10 5

Sargent & Co's..... 55x10 5

Hochstetler..... 55x10 5

NOTCHES & CLAWERS.

Humason & Beckley Mfg. Co..... 55x10 5

Bradley's..... 55x10 5

Bostley..... 55x10 5

5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28 29 30 31 32 33 34 35 36 37 38 39 40 41 42 43 44 45 46 47 48 49 50 51 52 53 54 55 56 57 58 59 60 61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80 81 82 83 84 85 86 87 88 89 90 91 92 93 94 95 96 97 98 99 100.....

CAN OPENERS.

American..... 55x10 5

New Idea..... 55x10 5

No. 4, French..... 55x10 5

No. 5, Iron Handle..... 55x10 5

Bardine Scissors..... 55x10 5

Sprague, No. 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40, 41, 42, 43, 44, 45, 46, 47, 48, 49, 50, 51, 52, 53, 54, 55, 56, 57, 58, 59, 60, 61, 62, 63, 64, 65, 66, 67, 68, 69, 70, 71, 72, 73, 74, 75, 76, 77, 78, 79, 80, 81, 82, 83, 84, 85, 86, 87, 88, 89, 90, 91, 92, 93, 94, 95, 96, 97, 98, 99, 100.....

Universal..... 55x10 5

CAPS, PERCUSSION, \$ 1.00.

U. M. C., F. C. trimmed..... 55x10 5

U. M. C., F. L. ground..... 55x10 5

U. M. C., C. m. ground..... 55x10 5

U. M. C., Double W. Froed..... 55x10 5

O. D. & S. B..... 55x10 5

K. B. 1-10. Key's..... 55x10 5

Munket, in 1-10's..... 55x10 5

Hicks Ground Edge in Brass Boxes..... 55x10 5

CARTRIDGES.

Rin..... 55x10 5

Central Fire, pistol..... 55x10 5

Military..... 55x10 5

B. B. Caps, Round Balls..... 55x10 5

Swaged Conical..... 55x10 5

NEW LIST OF CARTRIDGES.

Rin-fire, as short..... 55x10 5

30 35 40 45 50 55 60 65 70 75 80 85 90 95 100.....

Central Fire—30, 35, 40, 45, 50, 55, 60, 65, 70, 75, 80, 85, 90, 95, 100.....

CARDS.

Horse and Curry..... 55x10 5

Cotton, new list, Aug. 1883..... 55x10 5

Wool, new list, Aug. 1883..... 55x10 5

CARPET STRETCHERS.

Cast Steel, Polished..... 55x10 5

Cast Iron, Steel Points..... 55x10 5

Bullard's..... 55x10 5

CASTERS.

Bed..... 55x10 5

Plate and Shallow Sockets..... 55x10 5

Deep Sockets..... 55x10 5

Martin's Patent (Phoenix)..... 55x10 5

CATTLE LEADERS.

Humason, Beckley & Co's..... 55x10 5

THE MARKETS.

OFFICE MANUFACTURERS' RECORD, }
BALTIMORE, Jan. 18, 1888 }

There is a general improvement reported in business circles, and the easier money market is having the effect of causing increased activity in all industrial lines throughout the South. The great diversity of new enterprises that are being organized is especially noticeable. While iron industries are being pushed with unabated vigor, there is more activity in cotton mill building and enlargements than ever before. Mills are in many cases running night and day, and even then are unable to keep up with their orders.

Trade is fairly good in manufactured iron at former prices, though a little stiffening is reported. We quote:

Ref. Bar Iron, 1 to 2 1/2 to 3.....	2.100	2.400
" " 1 to 4 1/4 to 1 1/2.....	2.100	2.400
" " 3/4 to 2, round and.....	2.100	2.400
square.....	2.100	2.400
Hoop Iron, 1 1/4 wide and upward...	2.500	3 1/2
Band Iron, from 1 1/4 to 6 in. wide...	2.400	3 1/2
London.....	3	3 1/2
Norway Nail Rod.....	2 1/2	5 1/2
Black Diamond Cast Steel.....	3	9
Machinery Steel.....	3	4 1/2
Spring Steel.....	3 1/4	4 1/2
Common Horse Nails.....	3	9
Railroad Spike, 5 1/2 to 16.....	2 1/2	3 1/2
5 lb. Boiler Plate.....	2 1/2	3 1/2
Iron Boiler Plate.....	2 1/2	4
Boiler Tubes.....		50% off list

SCREW DRIVERS.

Douglas Mfg. Co.	dis 50x10
Diston's	dis 45
Cowles Mfg. Co.	dis 50x10
Stanley Rule & Level Co. s. Var. Hds.	dis 60
Stanley Rule & Level Co.'s Black Hds.	dis 50
Ratchet	dis 35
Clark's Patent	dis 35
Shepardson	dis 25

SPOKE TRIMMERS.

Bonney's	dis 50x10
Seam's	dis 50x10
Ives	dis 50x10
Douglas	dis 50x10

SILVER PLATED WARE.

Wm. Rogers Manf. Co.	dis 50x10
Holmes, Booth & Hayden	dis 50x10
Wallace's Steel Silver Plated	dis 35x10
Rogers Bros 1847	dis 50x10
C. Rogers & Bro.	dis 50x10

SCREWS.

Standard new list, Feb. 15.

Flat Head Bright	70
Round Head Bright	65
Flat Head Brass	65
Round Head Brass	70
Flat Head Blue (add 5¢ to net)	70
Brass and Silver Capped	40
Japanned Flat Head	65
Coach, Patent Gimlet Point	dis 66 1/2
Coach, Common or Lag	dis 70
Bed	dis 25
Machine, Flat Head, Iron	dis 55
Machine, Round Head, Iron	dis 55
Bench, Iron	dis 55
Bench, Wood, Beach	dis 55
Bench, Wood, Hickory	dis 55
Hand, Wood	dis 55
Hand Rail, Sargent's	dis 60
Hand Rail, Humason, Beckley & Co.'s	dis 40
Hand Rail, Am. Screw Co., list Jan. 1, '81	dis 70
Jack (Wilson's)	dis 25

SCREEN FRAMES AND WIKTURNS.

Standard Window Screens No. 1	dis 40
Door " " No. 5	dis 50
Window Corner Irons, No. 3	dis 50
Door " " No. 6	dis 50
Door Latches, 1/2 dozen	dis 30
Porter's Patent Window and Door Screen Frames	dis 50

PER DOZ. SETS.

No. 20	dis 75
No. 21	dis 75
No. 22	dis 75
No. 23	dis 75
No. 24	dis 75
No. 25	dis 75

Porter's Corners—

No. 4. Corners and Sticks complete for a three-foot window	dis 40
No. 1. Set for Window	dis 40
No. 1 1/2. " " " " " "	dis 40
No. 4. " " " " " "	dis 40
No. 4 1/2. " " " " " "	dis 40
No. 3 1/2. " " " " " "	dis 40
No. 3. " " " " " "	dis 40

Boughton's Adjus. Window and Door Screens dis 25
Boughton's Adjus. Window and Door Frames dis 50
Window screen frames (Stuart's) dis 25

SHARPERS AND SCISSORS.

American (Cast) Iron	dis 20
Pruning Hooks and Shears	dis 40
Barnard's Lamp Trimmers	dis 40
Timmer's	dis 40
Massachusetts	dis 40
Seymour's	dis 40
Jerry Shears	dis 40
J. Wess & Son, Nickel	dis 40
Japanned	dis 40

SHARPERS.

Sliding Door, M. W. & Co., List	dis 45
Sliding Door, R. & E. list	dis 60
Sliding Door, Patent Roller	dis 60
Sliding Door, Pt. Roller, Hatfield's	dis 60
Sliding Door, Russell's Anti-Friction	dis 60

SHOVELS AND SPADES.

Ames, New List, November 1, 1885	dis 50
Griffiths	dis 50
Rowland's (Lowman's Patent)	dis 50
Rowland's, new list	dis 50
Lippincott	dis 50
Hussey, Sims & Co.	dis 50

SILVER PLATED HOLLOW WARE.

Wm. Rogers Manf. Co.	dis 50
Meriden Britannia Co.	dis 40

SOLDERING IRONS AND COPPERS.

Covert's Soldering Irons	dis 35
Covert's Adjustable Coppers	dis 35

SPOONS.

Britannia	dis 60
Tinned Iron, Table and Tea	dis 65
Tinned Iron Hasting	dis 65
German Silver	dis 40

STONE.

Hindustan No. 1, 4c; Aze, 5c	dis 50
Sand Stone	dis 50
Washita Stone	dis 50
Washita Stone, Slips	dis 50
Arkansas	dis 50

SQUARES.

Steel	dis 60
Iron	dis 60
Nickel Plated	dis 60
Try Square and T Bevels	dis 60
Dresser's Try Square and T Bevels	dis 60

TACKS, BRADS, &c.

American Iron Carpet Tacks, all kinds	dis 75
Steel Carpet Tacks, all kinds	dis 75
Swedes Iron Carpet Tacks, all kinds	dis 75
Swedes Iron Tacks	dis 75
Swedes Iron Upholsterers' Tacks	dis 75
Tinned Swedes Iron Tacks	dis 75
Tinned Swedes Iron Upholsterers' Tacks	dis 75
American Iron Cut Tacks	dis 75
Gimp and Lace Tacks	dis 75
Tinned Gimp and Lace Tacks	dis 75
Copper Tacks	dis 75
Copper Finishing and Trunk Nails	dis 75
Cigar Box Nails	dis 75
Finishing Nails	dis 75
Trunk and Closet Nails	dis 75
Tinned Trunk and Closet Nails	dis 75
Basket Nails	dis 75
Chair Nails	dis 75
Zinc Glaciers' Points	dis 75
Common and Patent Brads	dis 75
Hungarian Nails and Miners' Tacks	dis 75
Tinned Capped Trunk Nails	dis 75

New Books.

METALLURGY OF SILVER, GOLD AND MERCURY

In the United States. Showing the latest practice pursued in American Metallurgical Establishments. With 186 Engravings and Folding Plates, Tables, etc. By Prof. Thos. Eggleston, School of Mines, Columbia College. Vol. 1.—SILVER, \$7.50.
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"This is another of these complete and elaborate treatises. It is beyond question the best on its subject in print."—Engineering News.
"It certainly is one of the finest contributions yet made to metallurgical science."—Iron.

TEXT-BOOK OF PHYSICS.

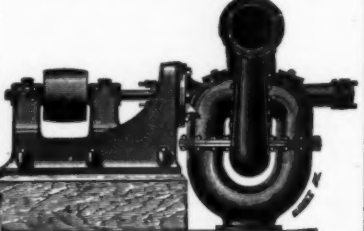
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GIVE YOUR MEN PLENTY OF LIGHT AND THEY WILL DO DOUBLE WORK.

The New Electric Wall Torch,

FOR COAL OIL OR NAPHTHA.
These torches are guaranteed to be the best in the market, and the only ones that will satisfactorily vaporize coal oil and naphtha without clogging up.
Produce a light equal to eight gas jets, at the cost of less than one penny per hour. They are used by the largest manufacturing establishments in the country, and we are prepared to furnish the highest testimonials.
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Reservoir made of the Best Cross Tin. Holds one gallon.



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FOR Brilliant, Economical Light. For Lighting Machine Works, Rolling Mills, Foundries, Saw Mills, &c.
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Patented DEC. 8th 1885, & NOV. 16th 1886
CANTON SAW WORKS CANTON, O.
Canton Rolling Cutler.
Canton Saw Wks.
Sole Manufacturers.
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Plow Manufacturers, Implement and Hardware Dealers will find this to give best of satisfaction of any Cutler in the market. Will fit any Right or Left Hand Wood or Iron Beam Plow made. Before buying your supplies correspond with us.

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It is sold generally by the jobbing trade.
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R. L. POLK & CO.

PUBLISHERS OF THE

BALTIMORE CITY DIRECTORY.

The canvass for the 1888 edition of the Directory is about completed. Parties who contemplate making a change in their business or residence will please notify us of the same, as the work will go to press by the 15th of December. All communications should be addressed to
B. R. SHERIFF, Manager,
119 N. Charles St. Baltimore, Md.

Looking Glass Tacks

Picture Frame Points	dis 45
Leathered Carpet Tacks	dis 45
Brush Tacks	dis 45

TAP BORERS.

Common and King	dis 20
Ives' Tap Borers	dis 10
Enterprise Mfg. Co.	dis 25

TOBACCO CUTTERS.

Enterprise Mfg. Co (Champion)	dis 50
Wood Bottom	dis 50
W. H. Iron	dis 50
Woods	dis 50

THERMOMETERS.

Tin Case	dis 75
Stem Glasses	dis 25

TON CALS.

Winsted	dis 50
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TRAPS.

Game, Newhouse	dis 35
Game, Onida Pattern	dis 40
Game, Blake's Patent	dis 40
Mouse, Wood, Choker	dis 10
Mouse, Round Wire	dis 10
Mouse, Catch-em-alive	dis 10
Cyclone Mouse	dis 10
Ideal Mouse	dis 10
Boss	dis 10
Rat, "Decoy"	dis 10
Delusion Mouse, per doz	dis 10
Ideal	dis 10

TROWELS.

Lothrop's Brick and Plastering	dis 30
Reed's Brick and Plastering	dis 15
Diston's Brick and Plastering	dis 15
Clement & Maynard's	dis 15
Worral's Brick	dis 15
Graden & Walby's	dis 15
Garden	dis 15
Rose's Brick	dis 15

TRUCKS (WAREHOUSE, &c.)

Handy Truck	dis 50
Penfield Block Co.'s list, 1886	dis 35
Peerless, with Cogs, No. 3	dis 35
Peerless, with Cogs, No. 4	dis 35
Kureks, No. 2	dis 35

VISES.

Cheney's Combined Vice and Anvil	dis 30
Solid Box—Wilson's	dis 50
Trenton	dis 50
Iron City Tool Works	dis 50

Manneer Drill Mfg. Co's—

Machinist's Vice	dis 30
Beach—Wilson's	dis 45
Trenton	dis 45
Parker's	dis 45
Prentiss	dis 45
Bonney's	dis 45
Well Wheels	dis 60
Stephen's Patent Vises	dis 60

WIRE.

Brass and Copper, list of Jan. 17, 1884	dis 45
Bright and Annealed	dis 60
Bright and Annealed	dis 60
Bright and Annealed	dis 60
Coppered	dis 60
Galvanized, Nos. 8 to 18	dis 40
Tinned, Nos. 8 to 18	dis 40
Tinned Broom Wire, Nos. 18 to 25	dis 60
Annealed Fence, Nos. 8 &c	dis 65
Annealed Grapes, Nos. 10 to 14	dis 65
Fence Staples, Galvanized	dis 50
Japanned Barb Fence	dis 50
Galvanized Barb Fence	dis 50
Buck Thorn Galvanized	dis 50
Picture Wire	dis 50
Picture Wire, Galvanized	dis 50
Wire Cloth, galv, drab and black	dis 50

WIRE NAILS.

Standard Penny Nails	dis 75
Wire Nails List, April 13, 1886	dis 50

WIRENCHES.

American Adjustable	dis 45
Baxter's Adjustable "S," list Jan. 1, 1886	dis 35
Baxter's Diagonal	dis 40
Cox's Genuine	dis 40
Cox's "Mechanic"	dis 40
Cox's Pattern, Malleable	dis 40
Cox's Pattern, Wrought	dis 40
Girard Standard	dis 40
Girard Agl.	dis 40
Always Ready	dis 40
Collins' Wrenches	dis 40

WIRENCHES. Per doz.

Universal, XX, No. 2 1/2	dis 30
Universal, XX, No. 2	dis 30
Universal, XX, No. 1 1/2	dis 30
Universal, XX, No. 1	dis 30
Universal, XX, No. 3/4	dis 30
Universal, XX, No. 1/2	dis 30
Universal, XX, No. 3/8	dis 30
Universal, XX, No. 1/4	dis 30
Universal, XX, No. 3/16	dis 30
Universal, XX, No. 1/8	dis 30
Universal, XX, No. 3/32	dis 30
Universal, XX, No. 1/32	dis 30
Peerless, No Cogs, No. 1	dis 40
Peerless, with Cogs, No. 2 1/2	dis 40
Peerless, with Cogs, No. 2	dis 40

MISCELLANEOUS.

"Diamond" Vegetable Grater	dis 50
Rotary Knife Potato Parer	dis 50
Metallic Shingles	dis 50
Hopper Cherry Seeders	dis 50

NEW SCOTT MANFG. CO'S

Rotary Peach Parer	dis 50
Gold Medal Apple Parer	dis 50
Orion Apple Parer, Corer & Slicer	dis 50
Victor	dis 50
Improved Hopper Cherry Seeders	dis 50

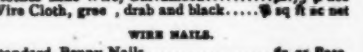
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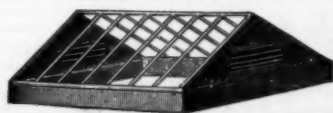
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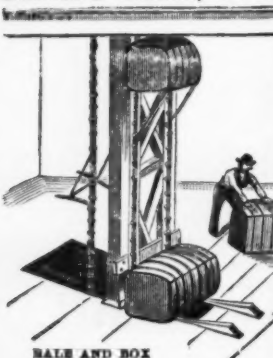
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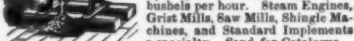
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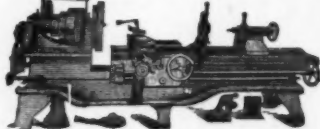
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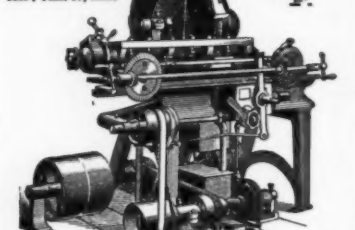
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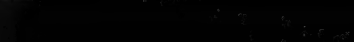
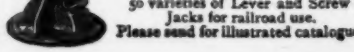
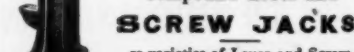
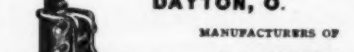
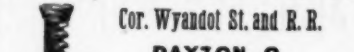
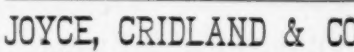
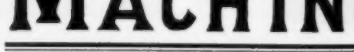
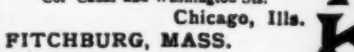
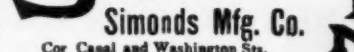
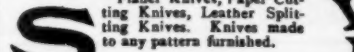
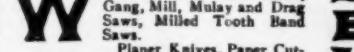
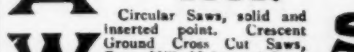
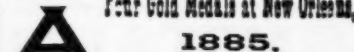
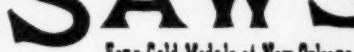
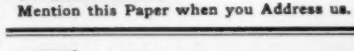
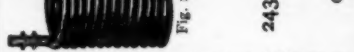
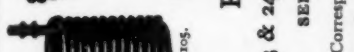
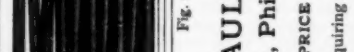
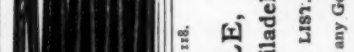
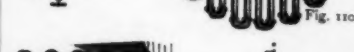
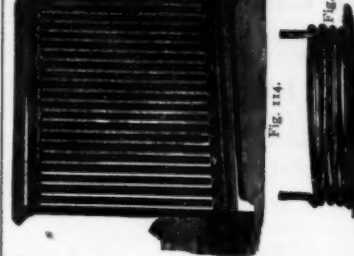
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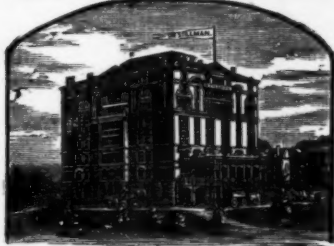
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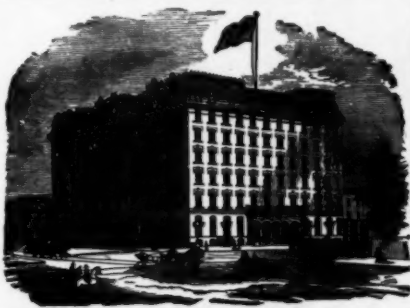
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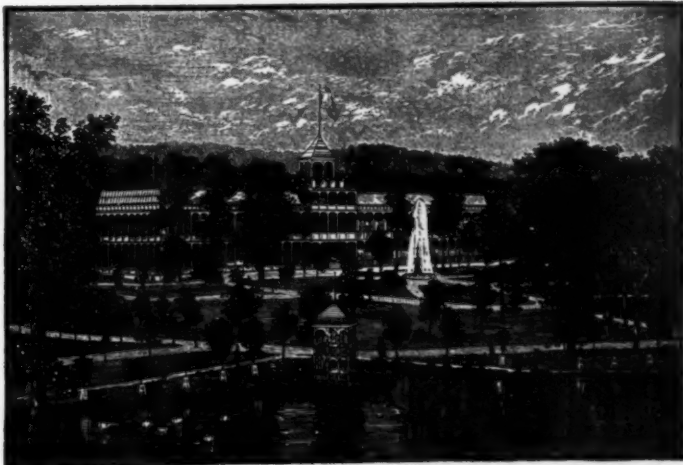
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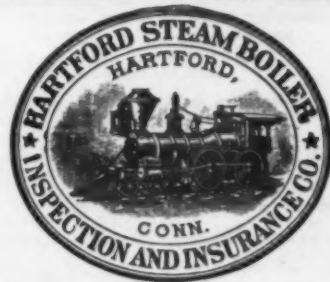
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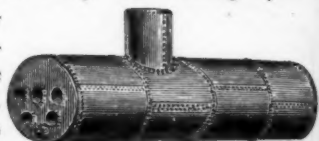
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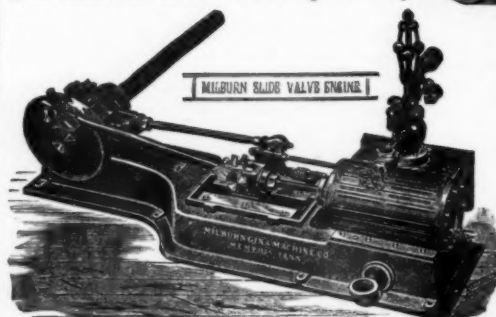
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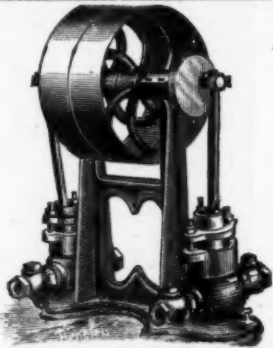
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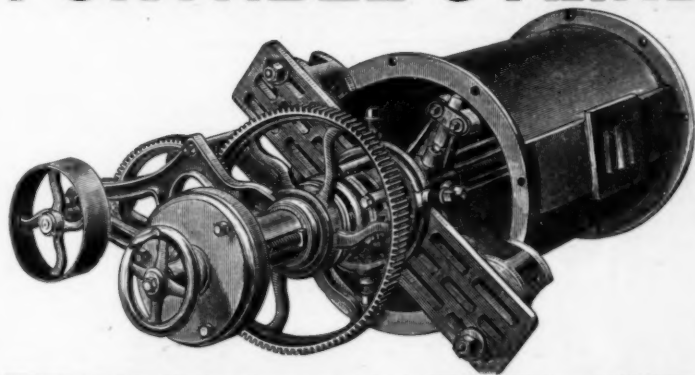
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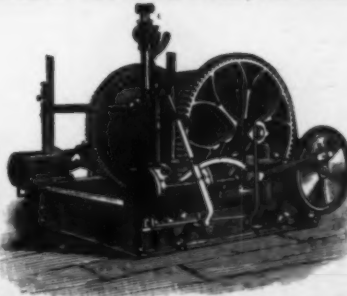
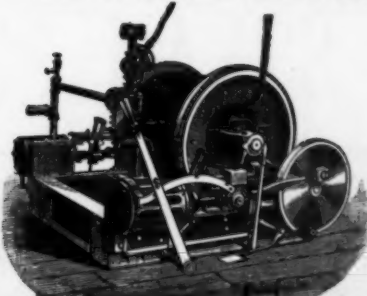
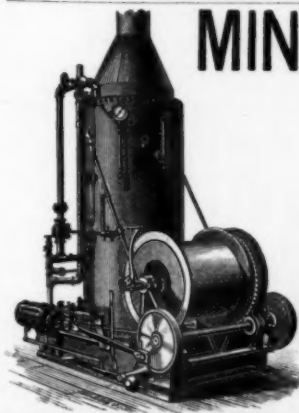
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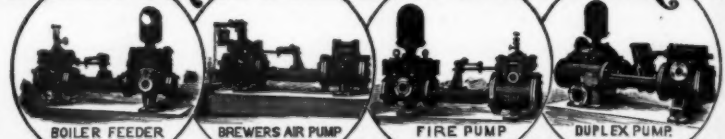


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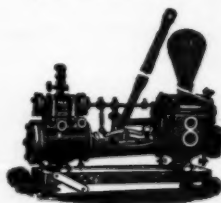
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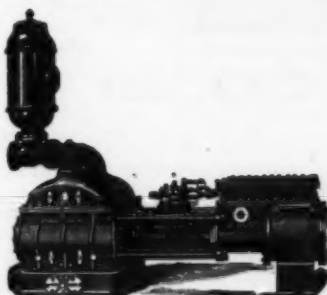
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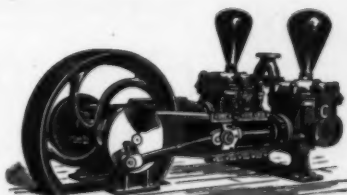
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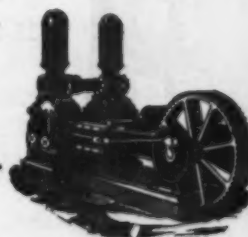
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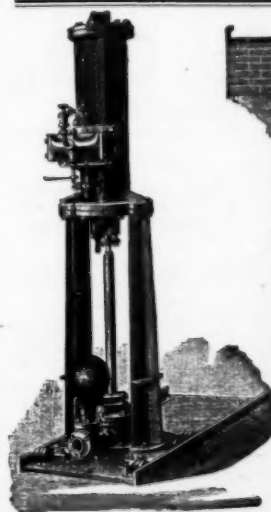
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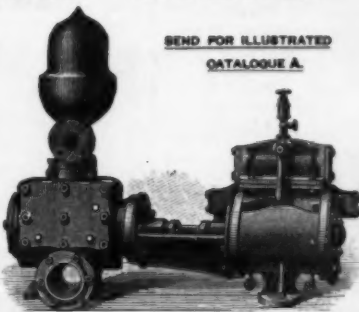
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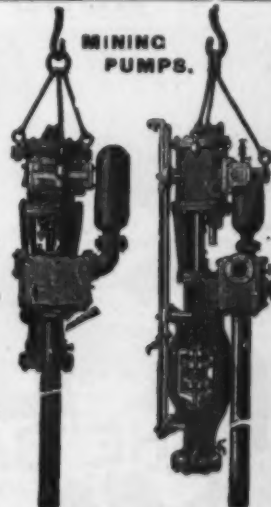
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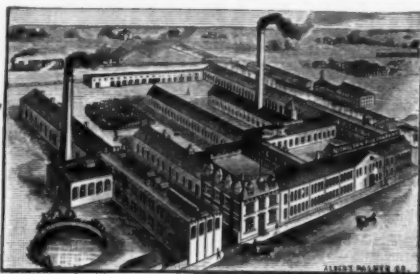
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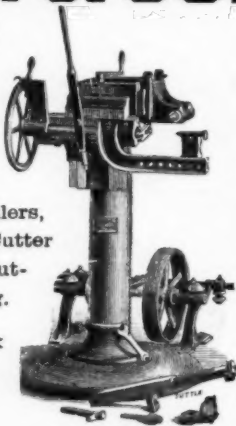
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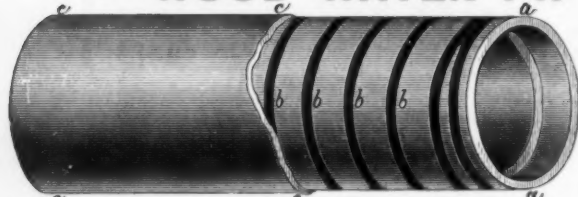
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